

## SERVICE MANUAL

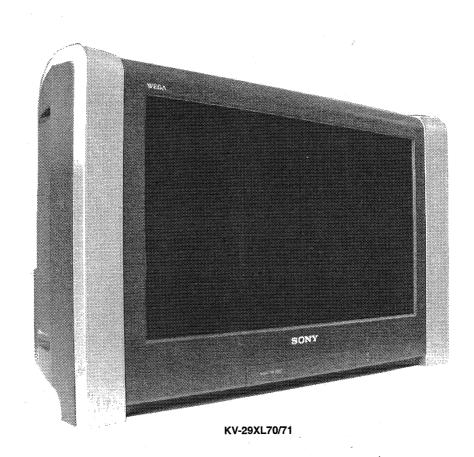
## AE-6B CHASSIS

MODEL	COMMANDER	DEST	CHASSIS NO.	MODEL	COMMANDER	DEST	CHASSIS NO.
KV-29XL70E	RM-944	ESP	SCC-Q81X-A	KV-29XL71E	RM-934	ESP	SCC-Q81W-A
KV-29XL70K	RM-944	OIRT	SCC-Q82M-A	KV-29XL71K	RM-934	OIRT	SCC-Q82N-A

## **FD** Trinitron



RM-934





RM-944

TRINITRON © COLOR TV

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## CAUTION

SHORT CIRCUIT THE ANODE OF THE PICTURE TUBE AND THE ANODE CAP TO THE METAL CHASSIS, CRT SHIELD, OR THE CARBON PAINTED ON THE CRT, AFTER REMOVAL OF THE ANODE CAP.

## WARNING !!

AN ISOLATION TRANSFORMER SHOULD BE USED DURING ANY SERVICE WORK TO AVOID POSSIBLE SHOCK HAZARD DUE TO LIVE CHASSIS, THE CHASSIS OF THIS RECEIVER IS DIRECTLY CONNECTED TO THE POWER LINE.

## SAFETY-RELATED COMPONENT WARNING !!

COMPONENTS IDENTIFIED BY SHADING AND MARKED & ON THE SCHEMATIC DIAGRAMS, EXPLODED VIEWS AND IN THE PARTS LIST ARE CRITICAL FOR SAFE OPERATION. REPLACE THESE COMPONENTS WITH SONY PARTS WHOSE PART NUMBERS APPEAR AS SHOWN IN THIS MANUAL OR IN SUPPLEMENTS PUBLISHED BY SONY.

## **ATTENTION**

APRES AVOIR DECONNECTE LE CAP DE'LANODE, COURT-CIRCUITER L'ANODE DU TUBE CATHODIQUE ET CELUI DE L'ANODE DU CAP AU CHASSIS METALLIQUE DE L'APPAREIL, OU AU COUCHE DE CARBONE PEINTE SUR LE TUBE CATHODIQUE OU AU BLINDAGE DU TUBE CATHODIQUE.

## ATTENTION !!

AFIN D'EVITER TOUT RISQUE D'ELECTROCUTION PROVENANT D'UN CHÁSSIS SOUS TENTION, UN TRANSFORMATEUR D'ISOLEMENT DOIT ETRE UTILISÈ LORS DE TOUT DÈPANNAGE LE CHÁSSIS DE CE RÈCEPTEUR EST DIRECTMENT RACCORDÈ Á L'ALIMENTATION SECTEUR.

## ATTENTION AUX COMPOSANTS RELATIFS Á LA SECURITÈ!!

LES COMPOSANTS IDENTIFIÈS PAR UNE TRAME ET PAR UNE MARQUE & SUR LES SCHÈMAS DE PRINCIPE, LES VUES EXPLOSÈES ET LES LISTES DE PIECES SONT D'UNE IMPORTANCE CRITIQUE POUR LA SÈCURITÈ DU FONCTIONNEMENT, NE LES REMPLACER QUE PAR DES COMPSANTS SONY DONT LE NUMÈRO DE PIÈCE EST INDIQUÈ DANS LE PRÈSENT MANUEL OU DANS DES SUPPLÈMENTS PUBLIÈS PAR SONY.

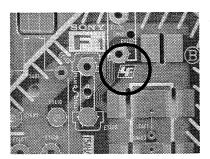
## **CAUTION**

## Lead Free Soldered Boards

The circuit boards listed below [Table 1] used in these models may have been processed using Lead Free Solder. The boards are identified by the LF logo located close to the board designation e.g. F1, H1 etc [ see examples ]. The servicing of these boards requires special precautions to be taken as outlined below.



example 1



example 2

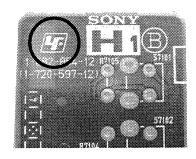


Table 1

Board	Function
А	Video & Audio Processors, Audio Output, Vertical Deflection
С	R,G,B Out
F1	Power Switch/Fuse/SIRCS/Standby LED
Н6	Front AV Input/Headphone and Control Switches
VM	Velocity Modulation

It is strongly recommended to use Lead Free Solder material in order to guarantee optimal quality of new solder joints. Lead Free Solder is available under the following part numbers :

Partnumber	Diameter	Remarks
7-640-005-19	0.3mm	0.25Kg
7-640-005-20	0.4mm	0.50Kg
7-640-005-21	0.5mm	0.50Kg
7-640-005-22	0.6mm	0.25Kg
7-640-005-23	0.8mm	1.00Kg
7-640-005-24	1.0mm	1.00Kg
7-640-005-25	1.2mm	1.00Kg
7-640-005-26	1.6mm	1.00Kg

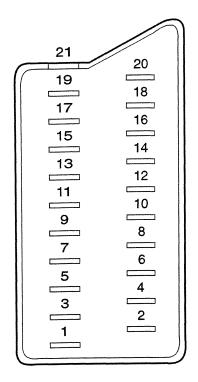
Due to the higher melting point of Lead Free Solder the soldering iron tip temperature needs to be set to 370 degrees centigrade. This requires soldering equipment capable of accurate temperature control coupled with a good heat recovery characteristics.

For more information on the use of Lead Free Solder, please refer to http://www.sony-training.com

ITEM MODEL	Television System	Stereo System	Channel Coverage	Color System
E	. B/G/H, D/K	GERMAN/NICAM Stereo	VHF: E2-E12, R1-R12, S01-S03 UHF: E21-E69, R21-R69 CABLE TV: S01-S20 HYPER: S21-S41	PAL, SECAM NTSC4.43, NTSC3.58 (VIDEO IN)
К	B/G/H, D/K	GERMAN/NICAM Stereo	VHF: E2-E12, R1-R12, S01-S03 UHF: E21-E69, R21-R69 CABLE TV: S01-S20 HYPER: S21-S41	PAL, SECAM NTSC4.43, NTSC3.58 (VIDEO IN)

		Sound output			
Picture Tube	Flat Display FD Trinitron Approx 73 cm (29 inches)	Right and Left speaker	2x20W (Music Power) 2x10W (RMS)		
		Sub Woofer	1x30W (Music Power) 1x15W (RMS)		
Input/Output Terminals [	REAR]	General Specifications	3		
1: 21-pin Euro connector (CENELEC standard)	Inputs for Audio and Video signals. Inputs for RGB. Outputs of TV Video and Audio signals.	Power Requirements	220 - 240V		
		Power Consumption	130W		
2: 21-pin Euro connector	Inputs for Audio and Video signals. Inputs for RGB. Outputs of TV Video and Audio signals.	Dimensions	Approx 771 x 585 x 506mm		
	(Monitor Out)	Weight	Approx 48.5kg		
3: 21-pin Euro connector (SMARTLINK)	Inputs for Audio and Video signals. Inputs for S Video. Outputs of TV Video and Audio signals. (selectable)	Supplied Accessories	RM-934 Remote Commander (1) (KV-29XL71) RM-944 Remote Commander (1) (KV-29XL70) IEC designated R6 battery (2)		
Phono Jacks	Output Connectors variable for Audio Signals	Other Features	100 Hz picture, Teletext, Smartlink, TV system autodetection, PIP, Dolby Virtual, BBE, Sleep Timer		
Input/Output Terminals	[FRONT]	Remote Control System : Infrared Control			
Headphone jack	stereo mini jack				
Audio inputs	phono jacks		3V dc		
Video inputs	phono jacks	Power requirements	2 batteries IEC designation R6 (size AA)		
S Video input	4 pin DIN		1.5 (5.5.5 )		
•	Design and specifications are	subject to change with	out notice.		

Model Name Item	KV-29XL70E	KV-29XL70K	KV-29XL71E	KV-29XL71K
Pal Comb	OFF	OFF	OFF	OFF
PIP	ON	ON	ON	ON
RGB Priority	ON	ON	ON	ON
Woofer Box	ON	ON	ON	ON
Scart 1	ON	ON	ON	ON
Scart 2	ON	ON	ON	ON
Scart 3	ON	ON	ON	ON
Front in (4)	ON	ON	ON	ON
Projector	OFF	OFF	OFF	OFF
Norm B/G	ON	ON	ON	ON
Norm I	OFF	OFF	OFF	OFF
Norm D/K	ON	ON	ON	ON
Norm AUS	OFF	OFF	OFF	OFF
Norm L	OFF	OFF	OFF	OFF
Norm SAT	OFF	OFF	OFF	OFF
Norm M	OFF	OFF	OFF	OFF
Teletext	ON	ON	ON	ON
Nicam Stereo	ON	ON	ON	ON

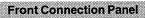


Pin No	1	2	3	Signal	Signal level
1	0	0	0	Audio output B (right)	Standard level : 0.5V rms Output impedence : Less than 1kohm*
2	0	0	0	Audio input B (right)	Standard level : 0.5V rms Output impedence : More than 10kohm*
3	0	0	0	Audio output A (left)	Standard level : 0.5V rms Output impedence : Less than 1kohm*
4	0	0	0	Ground (audio)	
5	0	0	0	Ground (blue)	
6	0	0	0	Audio input A (left)	Standard level : 0.5V rms Output impedence : More than 10kohm*
7	0	•	•	Blue input	0.7 +/- 3dB, 75 ohms positive
8	0	0	0	Function select (AV control)	High state (9.5-12V) : Part mode Low state (0-2V) : TV mode Input impedence : More than 10K ohms Input capacitance : Less than 2nF
9	0	0	0	Ground (green)	
10	0	0	0	Open	
11	0	•	•	Green	Green signal : 0.7 +/- 3dB, 75 ohms, positive
12	0	0	0	Open	
13	0	0	0	Ground (red)	
14	0	0	0	Ground (blanking)	
	0	-	-	Red input	0.7 +/- 3dB, 75 ohms, positive
15	-	0	0	(S signal Chroma input)	0.3 +/- 3dB, 75 ohms, positive
16	0	•	•	Blanking input (Ys signal)	High state (1-3V) Low state (0-0.4V) Input impedence : 75 ohms
17	0	0	0	Ground (video output)	
18	0	0	0	Ground (video input)	
19	0	0	0	Video output	1V +/- 3dB, 75ohms, positive sync 0.3V (-3+10dB)
	0	-	-	Video input	1V +/- 3dB, 75ohms, positive sync 0.3V (-3+10dB)
20	-	0	0	Video input Y (S signal)	1V +/- 3dB, 75ohms, positive sync 0.3V (-3+10dB)
21	0	0	0	Common ground (plug, shield)	

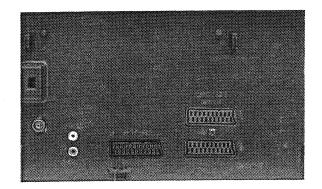
O Connected

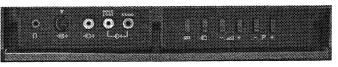
Not Connected (open) \* at 20Hz - 20kHz

## Rear Connection Panel



S-Video socket





S Video socket pin configuration						
Pin No	Signal	Signal Level				
1	Ground	-				
2	Ground	-				
3	Y (S signal) input	1V+/- 3dB 75ohm, positive Sync. 0.3V -3 +10dB				
4	C (S signal) input	0.3V+/- 3dB 75ohm, positive Sync.				

## **AE-6B SELF DIAGNOSTIC SOFTWARE**

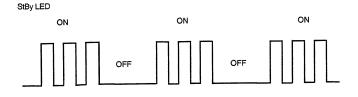
The identification of errors within the AE-6B chassis is triggered in one of two ways: -1: Busy or 2: Device failure to respond to IIC. In the event of one of these situations arising the software will first try to release the bus if busy (Failure to do so will report with a continuous flashing LED) and then communicate with each device in turn to establish if a device is faulty. If a device is found to be faulty the relevant device number will be displayed through the LED (Series of flashes which must be counted) See table 1, non fatal errors are reported using this method.

Each time the software detects an error it is stored within the NVM. See Table 2.

Table 1

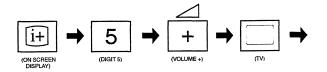
Error Message	LED Code
No error	00
Reserved	01
OCP ( Over Current Protection )	02
Over Voltage Protection	03
No Vertical Sync	04
IKR Error at power on	05
IIC bus clock and/or data lines low at power on	06
NVM no IIC bus acknowledge at power on	07
Horizontal Protection	08
Tuner no acknowledge at power on	09
Sound Processor Error	10
Reserved	11
Scanrate Error	12
DAC Error	13
Backend Error	14
Dynamic Convergence Error	15
PIP Error	16

## Flash Timing Example: e.g. error number 3



## How to enter into Table 2

- Turn on the main power switch and enter into the stand-by mode
- Press the following sequence of buttons on the Remote Commander.



'TT—' will appear in the upper right corner of the screen. Other status information will also be displayed.

- Press 'MENU' on the remote commander to obtain the Service menu on the screen.
- Using the Remote Commander, Scroll to the 'Error Menu' item using the down arrow key, then press the right arrow key.
- The following table will be displayed indicating the error count.

Table 2

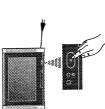
ERROR MENU			
E02 E03 E04 E05 E06 E07 E08 E09 E10 E11 E12 E13 E14 E15	OCP OVP VSYNC IKR IIC NVM HPROT TUNER SOUNDP - SCANRATE DAC BACKEND DYN CON	(0, 255) (0, 255)	0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0
E16	PIP	(0, 255)	0
WORKING TIME HOURS MINUTES			14 7

**Note:** To clear the error count data press '80' on the Remote commander.

The operating instructions mentioned here are partial abstracts from the 'Operating Instruction Manual'. The page numbers of the 'Operating Instruction Manual' remain as in the manual

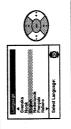
# Switching on the TV and Automatically Tuning

- The first time you switch on your TV, a sequence of menu screens appear on the TV enabling you to: 1) choose the language of the menu screen, 2) choose the country in which you wish to operate the TV, 3) adjust the picture slant 4) search for and store all available channels (TV Broadcasts) and 5) change the order in which the channels (TV Broadcasts) appear on the screen. However, if you need to change any of these settings at a later date, you can do that by selecting the appropriate option in the (CF Up menu) or by pressing the Auto Start Up Button |
  - Connect the TV plug to the mains socket (220-240V AC, 50Hz). The first time that the TV set is connected, it is usually turned on. If the TV is off, press the O on/off button on the TV set to turn on the TV. If the first time you switch on the TV, a Language menu appears automatically on the TV screen.

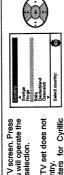


Press the • or • button on the remote control to select the language, then press the **OK** button to confirm your selection. From now on all the menus will appear in the selected language.

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go to step 8.

The Country menu appears automatically on the TV screen. Press the \$\infty\$ or \$\infty\$ button to select the country in which you will operate the TV set, then press the **OK** button to confirm your selection.

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- If the country in which you want to use the TV set does not appear in the list, select "" instead of a country.
   In order to avoid wrong teletax characters for Cyrillic languages we recommend you select flussia as the country. if your own country does not appear in the list.
- Because of the earth's magnetism, the picture might slant. The Picture Rotation menu allows you to correct the picture slant if it

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is necessary,

If it is not necessary, press the \* or \* button to select Not

necessary and press OK.

b) If it is necessary, press the \* or \* button to select Adjust now,
then press OK and correct any slant of the picture between—5
and \*5 by pressing the \* or \* button. Finally press OK to store.



# Switching on the TV and Automatically Tuning

The Auto Tuning menu appears on the screen. Press the **OK** button to select **Yes**. Ŋ



282 This procedure could take some minutes. Please be patient and do not press any buttons, otherwise the automatic tuning will not be completed. The TV starts to automatically search and store all available

broadcast channels for you.

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No channel found Please connect aerial If no channels were found during the auto tuning process then a new menu appears automatically on the screen asking you to connect the aerial. Please connect the aerial (see page 6) and press OK. The auto tuning process starts again.















Repeat steps b)1 and b)2 if you wish to change the order of

Press the MENU button to remove the menu from the screen.

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Your TV is now ready for use.

continued...

## Introducing and Using the Menu System

Your TV uses an on-screen menu system to guide you through the operations. Use the following buttons on the Remote Control to operate the menu system:

Press the MENU button to switch the first level menu on.



To highlight the desired menu or option, press + or + button.
To enter to the selected menu or option, press +.
To return to the last menu or option, press +.
To alter the settings of your selected option, press +/+/+ or +.
To confirm and store your selection, press the OK button.

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Press the MENU button to remove the menu from the screen

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СВ

## Menu Guide

Level 1

Level 2



-01

## Level 3 / Function

PICTURE ADJUSTMENT

The "Picture Adjustment" menu allows you to atter the picture adjustments. To do this:

After selecting the item you want to after press the 
button, then repeatedly press the \*/\*/\* or \* buttons
to make any adjustments and finally press the OK button to store. This menu also allows you to customise the picture

- mode based on the programme you are watching:

   Personal (for individual settings).

   Live (for live broadcast programmes, DVD and Digital Set Top Box receivers).

   Movie (for films).
- Brightness, Colour and Sharpness can only be altered if "Personal" mode is selected.
  Hue is only available for NTSC colour signal (e.g. USA video tapes).
  Select Reset and press the OK button to return the picture settings to their factory preset levels.

continued...

# Introducing and Using the Menu System

Level 3 / Function Level 2



Level 1

The "Manual Programme Preset" option in the "Set Up" menu allows you to: MANUAL PROGRAMME PRESET

a) Preset channels or the VCR channel one by one to the programme order of your choice.

## To do this:

1 After selecting the "Manual Programme Presser" option, press the \* button then with Programme option highlighted press the \* buttons to select which programme number you want to preset the channel to (for VCR, select programme number; °0"). Then press the \* button.

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The availability of this option depends on the country you have selected in the "Language/Country" menu.

After selecting the System option, press the + button. Then press the + or + buttons to select the TV Broadcasts system (B/G for western European countries or D/K for eastern European countries). Press the + button.

channel tuning ("C" for terrestrial channels or "S" for cable channels). Next press + button. After that, press the numbered buttons to directly entier the channel number of the TV Broadcast or the VCR channel. If you do not know the channel number, press the \*or \*4 buttons to search for it. When you have tuned to the desired channel, press the OK button twice to store. After selecting the **Channel** option, press the **♦** button. Then press the **♦** or **♦** buttons to select the

Repeat all the above steps to tune and store more

b) Label a channel using up to five characters.

## To do this:

After highlighting the **Programme** option, press the **PROG** 4-button to select the programme number of the channel you wish to name. When the programme you want to name appears on the screen, select the Label option and press • button. Naxt press the • to • buttons to select a letter, number or "" for a blank. Press the • button to confirm theorlaracter. Select the other four characters in the same way. After selecting all the characters, press the **OK** button twice to store.

continued.

## Introducing and Using the Menu System

Level 2

Level 1

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## picture reception if the picture is distorted. Normally the automatic fine tuning (AFT) is in operation, but you can after it manually. c) Manually fine tune the TV to obtain a better Level 3 / Function

To do this:
Whilst watching the channel (TV Broadcast) you wish to fine tune, select the AFT option and press wish to fine tune, select the AFT option and press → button. Next press the ↑ or ◆ buttons to adjust the fine tuning between -15 and +15. Finally press the OK button twice to store.

Skip any unwanted programme numbers when they are selected with the PROG +/- buttons.

## To do this:

After highlighting the **Programme** option, press the **PROG 4**-button to select the programme number you want to skip. When the programme you want to skip appears on the screen, select the **Skip** option and press the **A** button. Next press the **A** button. Next press the **OK** button to select **Yes.** Finally press the **OK** button twice to confirm and store.

To cancel this function afterwards, select "No" instead of "Yes" in the step above.

- The availability of this option depends on the country you have selected in the "Language/Country" menu.

To do this:
Select the Decoder option and press the ◆
button. Next press the ♦ or ♦ buttons to select
On. Finally press the OK button twice to confirm
and store.

To cancel this function afterwards, select "Off" instead of "On" in the step above.

The "Noise Reduction" option in the "Detail Set Up" menu allows you to automatically reduce any picture noise visible in the broadcast signal. NOISE REDUCTION

## To do this:

After selecting the option, press the \* button. Then press the \* or \* buttons to select Auto. Finally press the OK button to confirm and store.

To cancel this function later on, select "Off" instead of "Auto" in the step above.

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# Introducing and Using the Menu System

Level 3 / Function	AV3 OUTPUT  The "AV3 Output" option in the "Detail Set Up" menu allows you to select the source to be output from the Scart connector (G-3/-@3 so you can record from this Scart any signal corning from the TV or from external equipment connected to Scart connectors (G-1/-@1 or G-2/-@2 or the front connectors ⊕34 or ⊕2 4 and ⊕ 4.	If your VCR supports Smartlink, this procedure is not necessary.	To do this:  After selecting the option, press the ◆ button. Then press the ♦ or ♦ buttons to select the desired output signal: TV, AV1, AV2, AV4, YC4 or AUTO.
Level 2		TITLE TOWN TOWN TOWN TOWN TOWN TOWN TOWN TOWN	Wildering Commerce Co
Level 1	Exercise Section 1	(III) SetVin	Aur Tung Aur Tung Aur Tung Aur Tung Aur Tung Aur Tung Aur

If you select "AUTO", the output signal will always be the same one that is displayed on the screen.

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If you have connected a decoder to the Scart socket (3-3/ 63 or to a VCR connected to that Scart socket, please remember to set the "AV3 Output" to "AUTO" or "TV" for correct unscrambling.

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TV SPEAKERS.
The "TV Speakers" option in the "Detail Set Up" ament allows you to mute the TV speakers in order to listen to the TV from an external amplifier connected to the audio outputs on the rear of the TV set.

To do this:

After selecting the option, press the \* button. Then press the \* or \* buttons to select Off. Finally press the OK button to confirm and store.

To cancel this function later on, select "On" instead of "Off" in the step above.



## RGB CENTRING

When connecting an RGB source, such as a "PlayStation", you may need to readjust the horizontal position of the picture. In that case, you can readjust it using the "RGB Centring" option in the "Detail Set Up".

To do this:
While watching an RGB source select the "RGB Centing" option and press the ◆ button. Then press the ♦ or ♦ buttons to adjust the centre of the picture between −10 and +10. Finally press the OK button to confirm and store.

# Introducing and Using the Menu System

## PIP INPUT The "PIP Input" option in the "Detail Set Up" menu allows you to select which picture source you want to watch in the "PIP" screen. After selecting the option, press the \* button. Then repeatedly press the \* or \* buttons to select the desired source (AV1, AV2, AV3, AV4 or TV). Finally press the OK button to store. Because of the earth's magnetism, the picture might start. If this is the case, you can correct the pictures start by using the option "Picture Rotation" in the 'Detail Set Up' menu. To do this: After selecting the option, press the ◆ button. Then press the ♦ or ♦ buttons to correct any slant of the picture between -5 and +5 and finally press the OK button to store. To watch the selected source of the "PIP" screen, press the CJ/O button on the remote control. You can swap the screens by pressing the ® (2) button on the remote control. PICTURE ROTATION Level 3 / Function To do this: $\odot$ $\odot$ . 1≥8000 **1** Level 2 A œ t 0 0 æ 0 œ 0 Level 1 **-**64

The "PIP Position" option in the "Detail Set Up" menu allows you to change the position of the "PIP" screen within the main screen.

After selecting the option the ♦, ♠, ♦ or ♦ button to select the desired position. Finally press the OK button to store. To do this:

**®** A 0 1

Language/Country
Auto Turing
Programme Sorting
Programme Labels
Any Preset
Manual Programme PreSocial Edit (50)

t 1

**Teletext** 

Teletext is an information service transmitted by most TV stations. The index page of the teletext service (usually page 100) gives you information on how to use the service. To operate teletext, use the remote control buttons as indicated below.

Teletext errors may occur if you use a channel (TV Broadcast) with a weak signal.

To Switch on Teletext:
After selecting the TV channel which carries the teletext service you wish to view, press the 

button.

TELETEXT

To Select a Teletext page:

Input the 3 digits of the page number, using the numbered buttons.

If you have made a mistake, retype the correct page number.

If the counter on the screen continues searching, it is because the page is not

In that case, input another page number.

To access the next or preceding page: Press PROG + (墨) or PROG - (圖) buttons.

GВ

Whilst you are viewing teletext, press the <a> button</a>. Press again to cancel teletext mode. To superimpose teletext onto the TV:

To freeze a teletext page: Press the 乏/倭 button. Press again to cancel freeze.

To reveal concealed information (e.g. answer to a quiz): Press the (日/① button. Press again to conceal the information.

To select a sub page:

A teletaxt page may consist of several sub pages. In this case the page number that appears on the upper left corner changes colour from yellow to green, and one or more arrows will appear next to the page number. Repeatedly press the  $\star$  or  $\star$  buttons on the remote control to watch the desired sub page.

To Switch Off Teletext:

Press O button.

Fastext

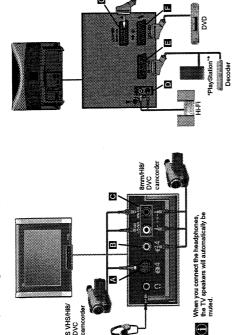
The Fastext service lets you access pages with one button push.

While you are in Teletext mode and providing Fastext is broadcast, a colour coded menu appears at the bottom of the teletext page. Press one of the coloured buttons (red, green, yellow or blue) to access the

corresponding page.

## Connecting Additional Equipment

Using the following instructions you can connect a wide range of optional equipment to your TV set. (Connecting cables are not supplied).



VCR.

- \* "PlayStation" is a product of Sony Computer Entertainment, Inc. \* "PlayStation" is a trademark of Sony Computer Entertainment, Inc.
- To avoid picture distortion, do not connect external equipment to connectors 🐧 and 🖪 at the same
- Do not connect a Decoder to the Scart connector

To connect a VCR, please refer to the section "Connecting the aerial and VCR" of this instruction manual. We recommend you connect your VCR using a Scart lead, if you do not have a Scart lead, tune in the VCR test signal to the TV programme number of "by using the "Manual Programme Preser" option. (for details of how to manually programme these presets, see page 13, step a).

Refer to your VCR instruction manual to find out the output channel of your VCR. Connecting a VCR

Connecting a VCR that supports Smartlink:

Smartlink is a direct link between the TV set and the VCR. For more information on Smartlink, please feet to the instruction manual of your VCR.

If you use a VCR that supports Smartlink, please connect the VCR by using a Scart lead to the Scart socket (3-3/€3 €).

# If you have connected a decoder to the Scart →3/⊕3 C or through a VCR connected to

Select the "Manual Programme Preset" option in the "Set Up" menu and after selecting the "Decoder\*" option, select "On" (by using the ♦ or ♦ button). Repeat this procedure for each scrambled signal.

\*\* The availability of this option depends on the country you have selected in the "Language/Country" menu.

continued..

## Connecting Additional Equipment

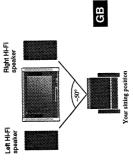
## Connecting to external Audio Equipment:

Plug in your Hi-Fi equipment to the audio output sockets **ID** if you wish to amplify the audio output from your TV. Next, using the menu system, select the "Set Up" menu. Enter the "Detail Set Up" menu and set "TV Speakers" to "Off".

The audio level of the external speakers can be modified by pressing the volume buttons on the remote control. Also, treble and bass settings can be modified through the "Sound Adjustment" menu.

# To enjoy "Dolby Virtual" sound effect through your Hi-Fi equipment:

Place the speakers of your equipment in front of your sitting position and besides the TV set, but keeping a distance of 50 cm from each speaker to the TV Set and select the menu system, select the menu Sound Adjustment, and select Toolby Virtual" on the "Effect" option.



## **Using optional Equipment**

- Connect your equipment to the designated TV socket, as indicated in the previous page.
- Switch on the connected equipment.
- To watch the picture from the connected equipment, press the 长 button repeatedly until the correct input symbol appears on the screen.

## Input Signals Symbol

- Audio / video input signal through the Scart connector ō
- RGB input signal through the Scart connector . This symbol appears only if a RGB source has been connected. ā
- Audio / video input signal through the Scart connector [ ]. õ
- RGB input signal through the Scart connector . This symbol appears only if a RGB source has been connected. φ
- Audio/video input signal through the Scart connector G.  $\tilde{\varphi}$
- S Video Input signal through the Scart connector **(a)**. This symbol appears only if a S Video source has been connected. 8
- Video input signal through the phono socket **B** and Audio input signal through phono socket **G**. Φ
- S Video Input signal through the front S Video input jack M and Audio signal through
  phono socket G. This symbol appears only if a S Video source has been connected. **P**
- 4 Press C button on the remote control to return to the normal TV picture.

For Mono Equipment
Connect the phono plug to the L/G/S/I socket on the front of the TV and select + © 4 or + 34 input signal
using the instructions above. Finally, refer to the "Sound Adjustment" section of this manual and select "Dual
Sound" + A" on the sound menu screen.

## Specifications

TV system	Depending on your country selection B/G/H, D/K
Colour System	PAL, SECAM NTSC 3.58, 4.43 (Video In only)
Channel Coverage	VHF: E2-E12 UHF: E21-E69 CATY: \$1-\$20 HYPER: \$21-\$41 D/K: R1-R12, R21-R69
Picture Tube	Flat display FD Trinitron 29" (approx. 73cm measured diagonally)
Rear Terminals	
	(\$\text{\$\pi\$}\$.4.\$\equiv \text{\$\pi\$}\$ 21-pin Scart connector (CENELEC standard) including audio/ video input, ROB input, monitor audio/video output audio/ (\$\text{\$\pi\$}\$) 21-pin Scart connector (CENELEC standard) including audio/ (\$\text{\$\pi\$}\$) 21-pin Scart connector (CENELEC standard) including audio/ (\$\text{\$\pi\$}\$) 4000 input, \$\text{\$\pi\$}\$ video input,
Front terminals	€34 S Video input - 4 pin DIN €14 Video input - phono jack ♠ 4 Audio input - phono jacks ↑↑ Headphones jack
Sound Output	2 x 20W (Music Power), 2 x 10W (RMS) Woofer: 30W (Music Power), 15W (RMS)
Power Consumption	130W
Standby Power Consumption	We'0
Dimensions (WxHxD)	Approx. 771mm x 585mm x 506mm
Weight	Approx. 48.5kg
Accessories Supplied	1 Remote Control (RM-944), 2 batteries (IEC designated)
Other Features	100Hz picture     Teletext, Fastext, TOPtext (250 page TEXT memory)     Sleep Timer     Sheep Timer     Sanatlink (direct link between your TV set and a compatible VCR. For more information on Smartlink, please refer to the instruction Manual of your VCR)     TV system Autodetection     Dolby Virtual     BBE     PIP

Design and specifications are subject to change without notice.

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## **Troubleshooting**

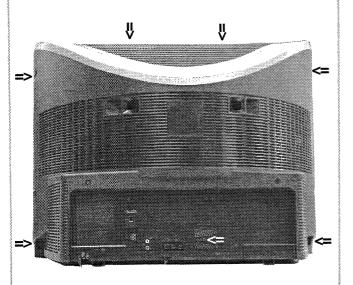
Here are some simple solutions to problems which may affect the picture and sound.

No picture (screen is dark), and no sound. • Cl	
• •	Check the aerial connection. Plug the TV in and press the <b>O</b> button on the front of the TV. In and press the <b>O</b> button of the standby indicator <b>O</b> is on press the IO button or a numbered button on the remote control.
Poor or no picture (screen is dark), but good • Us sound.	Using the MENU system, select the "Picture Adjustment" display and select "RESET" to retum to the factory settings.
No picture or menu information from equipment • C connected to the Scart socket.	Check that the optional equipment is on, and press the 🕘 button of the remote control repeatedly until the correct input symbol is displayed on screen.
Good picture, no sound.	Press the button on the remote control. Check that "TV Speakers" is "On" in the "Detail Set Up" menu. Check the Headphones are not connected.
No colour on colour programmes. • U A A fra	Using the MENU system, select the "Picture Adjustment" and select "RESET" to return to the factory settings.
Distorted picture when changing programmes or T selecting Teletext.	Turn off any equipment connected to the scart connectors on the rear of the TV.
Wrong characters appear when viewing teletext. • U C C a a a a a a a a a a a a a a a a a	Using the menu system, display the "Language/ Country" menu and select the country in which you are operating the TV set. For cyrillic languages, we recommend selecting *Russia if your own country does not appear in the list.
Picture slanted.	Using the menu system, select the "Picture Rotation" option in the "Detail Set Up" menu to correct the picture stant.
Snowy picture when viewing a TV channel. • U ( ( ( ( ) ( ) ( ) ( ) ( ) ( ) ( ) ( )	Using the menu system, select the "Manual Programme Preset" menu and adjust Fine Tuning (AFT) to obtain better picture reception. Using the menu system, select the "Noise Reduction" option in the "Detail Set Up" menu and select "Auto" to reduce the noise in the picture.
No unscrambled picture whilst viewing un • U unscrambled channel with a decoder connected through the scart connector (□•3/€33. • C	Using the menu system, display the "Set Up" menu. Then select the "Detail Set Up" option and set "AV3 Output" to "TV". Check that the decoder is not connected to the (3-2/ Cast socket.
Remote control does not function.	Replace the batteries.
The standby indicator & on the TV flashes.	Contact your nearest Sony service centre.

If you continue to have problems, have your TV serviced by qualified personnel.
 NEVER open the casing yourself.

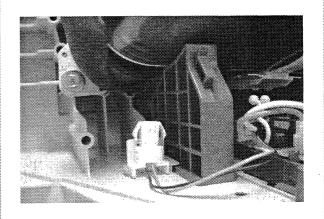
## **SECTION 2 DISASSEMBLY**

## 2-1. Rear Cover Removal



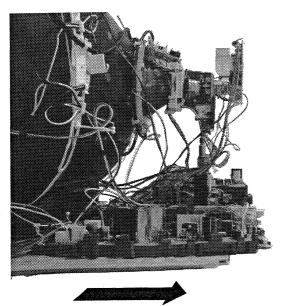
Remove the rear cover fixing screws indicated and pull the rear cover backwards away from the set.

## 2-2. Speaker Connector Disconnection

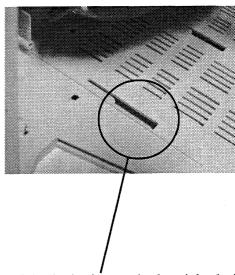


Before completely removing the rear cover disconnect the speaker connector which is located on the inside of the set.

## 2-3. Chassis Removal and Refitting

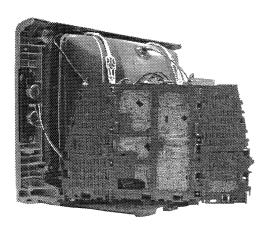


To remove lift the main bracket rear slightly and slide the chassis away from the beznet. Ensure that the interconnecting leads are released from their purse locks to prevent damage being caused.



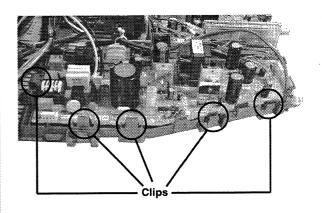
When refitting the chassis ensure that the main bracket is located in the beznet guide slots before sliding the chassis forwards. Refit the inter-connecting leads in their respective purse locks.

## 2-4. Service Position



To place the chassis in the service position, remove the H bracket and stand the chassis as shown above. To gain access to the underside of the boards follow the instructions on page 16. [Removal and Replacement of the main bracket bottom plates].

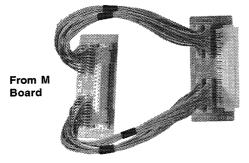
## 2-5. G Board Removal



To remove the G Board release the clips circled and ease the board gently away from the support bracket.

Removal of the D board follows the same procedure.

## 2-6. Service Connector for M Board



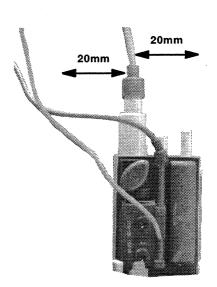
To A Board

Extender Board Assembly A-1642-293-A

If the M Board needs to be removed for testing when the chassis is placed in its service position, it would be necessary to use an extender board and extension cable as indicated above.

The Extender board and extension cable are available as a service part by ordering the part number as indicated.

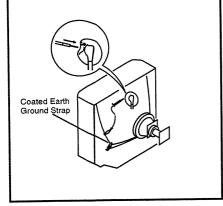
## 2-7. Wire Dressing

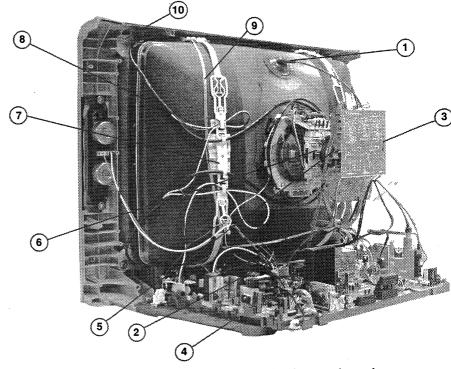


Ensure that wires do not touch heatsinks and high temperature hotspots. All wires must be kept at a minimum distance of 20mm away from the EHT lead

## WARNING: BEFORE REMOVING THE ANODE CAP

High voltage remains in the CRT even after the power is disconnected. To avoid electric shock, discharge CRT *before* attempting to remove the anode cap. Short between anode and CRT coated earth ground strap.



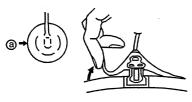


- 1. Discharge the anode of the CRT and remove the anode cap.
- 2. Unplug all interconnecting leads from the Deflection yoke, neck assy, degaussing coils and CRT grounding strap.
- 3. Remove the C Board from the CRT.
- 4. Remove the chassis assembly.
- 5. Loosen the Neck assembly fixing screw and remove.
- 6. Loosen the Deflection yoke fixing screw and remove.
- 7. Place the set with the CRT face down on a cushion and remove the Degaussing Coil holders.
- 8. Remove the Degaussing Coils.
- 9. Remove the CRT grounding strap and spring tensioners.
- 10. Unscrew the four CRT fixing screws [ located on each CRT corner ] and remove the CRT.

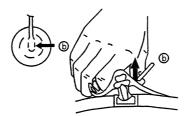
  [Take care not to handle the CRT by the neck.]

## Removal of the Anode-Cap

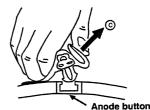
## REMOVAL PROCEDURE.



1 Turn up one side of the rubber cap in the direction indicated by the arrow (a)



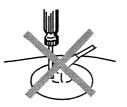
Using a thumb pull up the rubber cap firmly in the direction indicated by the arrow b

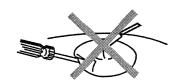


When one side of the rubber cap is separated from the anode button, the anode-cap can be removed by turning up the rubber cap and pulling it up in the direction of the arrow ©

## How to handle the Anode-Cap

- To prevent damaging the surface of the anode-cap do not use sharp materials.
- Do not apply too great a pressure on the rubber, as this may cause damage to the anode connector.
- A metal fitting called a shatter hook terminal is fitted inside the rubber cap.
- Do not turn the rubber foot over excessively, this may cause damage if the shatter hook sticks out.





## REMOVAL AND REPLACEMENT OF THE MAIN-BRACKET BOTTOM PLATES.

## (1) REMOVING THE PLATES

bottom plates fitted to the main chassis bracket require to be removed. This is performed by In the event of servicing being required to the solder side of the printed wiring boards, the cutting the gates with a sharp wire cutter at the locations indicated by the arrows. Note: There are 2 plates fitted to the main bracket. Only remove the necessary plate to gain access to the printed wiring board.

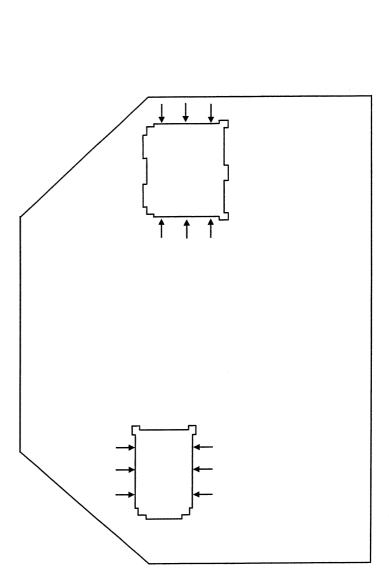
For safety reasons, on no account should the plates be removed and not refitted after servicing.

## (2) REFITTING THE PLATES

Because the plates differ in size it is important that the correct plates are refitted in their original

location.

Please note that the plates need to be rotated 180 degrees from their cut position to allow the tabs to be fitted into their catch positions.



Catch

Tab



## **SECTION 3 SET-UP ADJUSTMENTS**

- When complete readjustment is necessary or a new picture tube is installed, carry out the following adjustments.
- Unless there are specific instructions to the contrary, carry out these adjustments with the rated power supply.
- Unless there are specific instructions to the contrary, set the controls and switches to the following settings:

Contrast	•••••	norma
Brightness		norma

## Carry out the adjustments in the following order:

- 3-1. Beam Landing.
- 3-2. Convergence.
- 3-3. Focus.
- 3-4. White Balance.

Note: Test equipment required.

- Color bar/pattern generator.
- 2. Degausser.
- 3. Oscilloscope.
- 4. Digital multimeter.

## 3-1. Beam Landing

## Preparation:

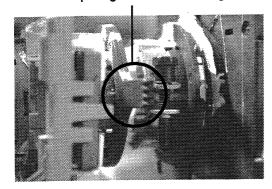
- In order to reduce the influence of geomagnetism on the set's picture tube, face it in an easterly or westerly direction.
- 2. Switch on the TV set's power and degauss with a degausser.

## (1) Adjustment of Correction Magnet for Y-Splitting Axis.

- 1. Input a crosshatch signal from the pattern generator.
- 2. Set the Picture control to minimum and confirm that the Brightness control is set to normal.
- 3. Position the neck assembly as indicated in Fig.3-2.
- 4. Loosen the deflection yoke fixing screw.
- 5. Move the deflection yoke as far forward as is possible.
- Adjust the upper and lower pin symmetrically by opening or closing the Y-splitting axis correction magnets located on the neck assembly. [See Fig 3-3]
- Return the deflection yoke to its original position and re-tighten its fixing screw.

Fig.3-1

## Y-splitting axis correction magnet



## Caution:

High voltages are present on the Deflection yoke terminals - take care when handling the Deflection yoke whilst carrying out adjustments.

## (2) Landing

**Note:** Before carrying out the following adjustments adjust the magnets as indicated [See Fig.3-4].

- 1. Input a crosshatch signal from the signal generator.
- 2. Rough-adjust the focus and horizontal convergence.
- 3. Switch from the crosshatch pattern to an all-red pattern.
- Move the deflection yoke backwards and adjust with the purity magnet so that the red is at the centre and it aligns symmetrically [See Fig.3-5].
- 5. Move the deflection yoke forward to the point where the entire screen just becomes red [Mark its position].
- 6. Move the deflection yoke further forward until the screen just changes colour at the edges. [Mark its position]
- Position the deflection yoke between the two marks indicated above
- Input a crosshatch pattern from the pattern generator and rotate the deflection yoke so that the horizontal lines are parallel with the top and bottom of the screen.
- When the position of the deflection yoke has been determined, fasten it with its fixing screw.
- Switch the pattern generator to green then blue and confirm the purity.
- 11. If the beam does not land correctly in all the corners of the screen, use disk magnets to correct it. [Confirm the corner landing for green and blue]

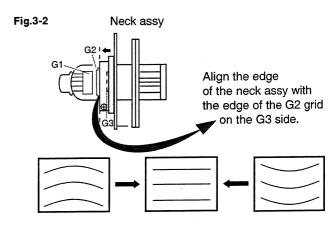
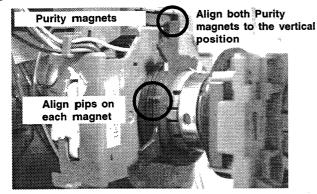


Fig.3-3

Fig.3-4



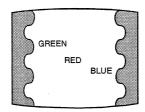
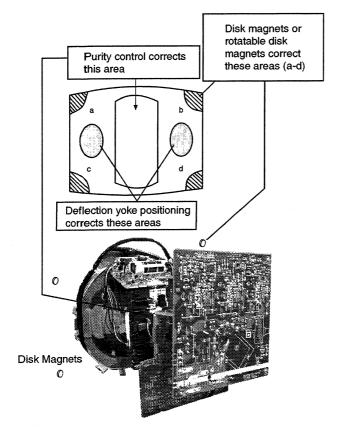
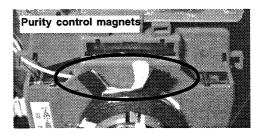


Fig.3-5

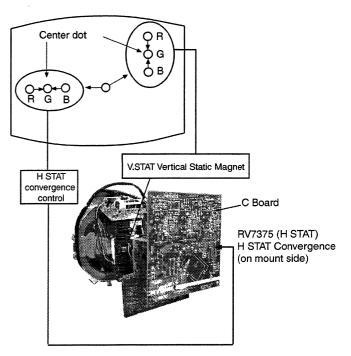




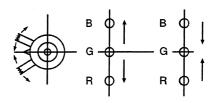
## 3-2. Convergence

## (1) Screen centre convergence [Static convergence]

- 1. Input a dot pattern signal from the pattern generator.
- 2. Normalize the picture setting.
- [Moving vertically], adjust the V.STAT magnet so that the vertical red, green and blue dots coincide at the centre of the screen.



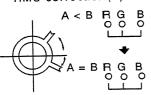
By opening or closing the V.STAT magnet, the red green and blue dots move in the direction indicated below.



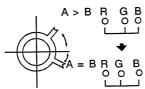
**Note:** Do not adjust the H.STAT by rotating the V.STAT magnets as this can affect the focus setting.

- Correction for HMC [Horizontal mis-convergence] and VMC [Vertical mis-convergence] by using the BMC [Hexapole] magnet.
- a). HMC correction by BMC [Hexapole] magnet and movement of the electron beam.

HMC correction(A)

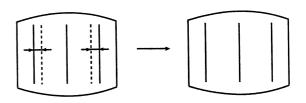


HMC correction(B)

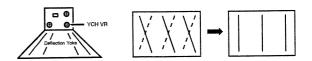


b). VMC correction by BMC [Hexapole] magnet and movement of the electron beam.

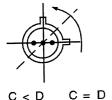
HTIL correction can be performed by adding a THL correction assembly to the Deflection yoke.

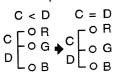


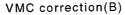
## **YCH Adjustment**

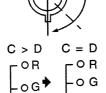


## VMC correction(A)

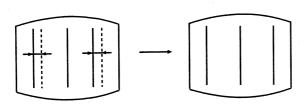








## **HAMP Adjustment**

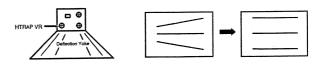


Adjust the HAMP using HAMPL and HAMPR registers in the Dynamic Convergence section of the service menu.

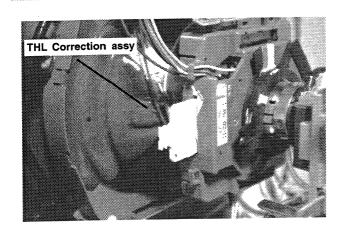
## **TLV Adjustment**



## H-TRAP Adjustment

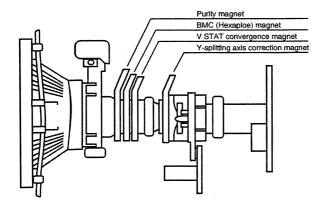


## HTIL Adjustment

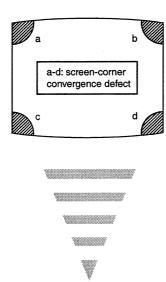


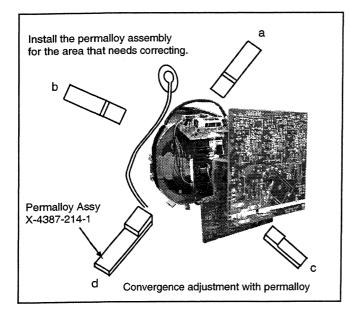
The H-TRAP should not be adjusted unless absolutely necessary as it affects the TLV settings.

## Layout of each control



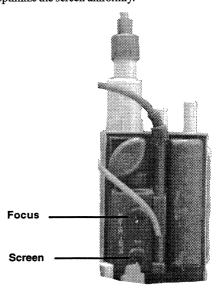
**Note:** If you are unable to adjust the corner convergence properly, this can be corrected with the use of permalloy magnets.





## 3-3. Focus Adjustment

- 1. Receive a television broadcast signal.
- 2. Normalize the picture setting.
- Adjust the focus control located on the flyback transformer to obtain the best focus at the centre of the screen.
   Bring only the centre area of the screen into focus, the magentaring appears on the screen. In this case, adjust the focus to optimize the screen uniformly.



## 3-4. Screen (G2), White Balance

[Adjustment in the service mode using the remote commander]

## G2 adjustment

- 1. Input a dot signal from the pattern generator.
- 2. Set the Picture, Brightness and Colour to minimum.
- Apply 165V DC from an external power supply to the R, G and B cathodes of the CRT.
- Whilst watching the picture, adjust the G2 control [SCREEN] located on the flyback transformer to the point just before the flyback return lines disappear.

## White balance adjustment for TV mode

- 1. Input an all-white signal from the pattern generator.
- 2. Set the TV set or operation in Service Mode. [See Page 21].
- 3. Select 'Service' from the on screen menu display and press 'Right Arrow'.
- 4. The 'Service' menu will appear on the screen.[See Page 22]
- 5. Set the 'Contrast' to MAX.
- 6. Set the 'R-Drive' to 50.
- 7. Adjust the 'G-Drive' and the 'B-Drive' so that the white balance becomes optimum.
- 8. Press the 'OK' button to write the data for each item.
- 9. Set the 'Contrast' to MIN.
- 10. Set the 'R-Cutoff' to 29.
- 11. Adjust the 'G-Cutoff', and the 'B-Cutoff' with the left and right buttons on the remote commander so that the white balance becomes optimum.
- 12. Press the 'OK' button to write the data for each item.

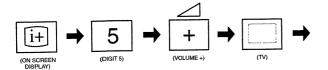
## SECTION 4 CIRCUIT ADJUSTMENTS

## 4-1. Electrical Adjustments

Service adjustments to this model can be performed using the supplied remote Commander RM-944 (KV-29XL70) or RM-934 (KV-29XL71).

## How to enter into the Service Mode

- 1. Turn on the main power switch and enter into the stand-by
- Press the following sequence of buttons on the Remote Commander.



"TT—" will appear in the upper right corner of the screen. Other status information will also be displayed.

Press 'MENU' on the remote commander to obtain the following menu on the screen.

Geometry
Service
Scanrate
DAC
Dyn. Conv.
PiP
Sound
IF adjust
Error Menu

AE6B v4.20 (Dic 03)
Factory data FFh FFh
MSP/Scan/IFOB: MSP3411G/9402-13/ON

- Move to the corresponding adjustment item using the up or down arrow buttons on the Remote Commander.
- 5. Press the right arrow button to enter into the required menu item.
- 6. Press the 'Menu' button on the Remote Commander to quit the Service Mode when all adjustments have been completed.

## Note:

 After carrying out the service adjustments, to prevent the customer accessing the 'Service Menu' switch the TV set OFF and then ON.

GEOMETRY		
ABL TH ABL MODE P ABL V SIZE V POSITION V COMP V LIN S CORRECTION H SIZE PIN AMP UP CORNERPIN M PIN LO CORNERPIN TRAPEZIUM H POSITION AFC BOW AFC ANGLE LEFT BLK RIGHT BLK V ASPECT AKBTIM1 AKBTIM2 IKR HNG VNG	(0, 3) (0, 3) (0, 15) (0, 63) (0, 63) (0, 15) (0, 63) (0, 63) (0, 63) (0, 63) (0, 15) (0, 63) (0, 15) (0, 63) (0, 63) (0, 63) (0, 63) (0, 63) (0, 63) (0, 63) (0, 63) (0, 63)	0 0 15 35 33 1 7 7 44 32 29 2 29 2 40 8 9 34 17 47 2 0

DYN. CONV.		
RANGE YupL VAL YlowL VAL MBOWupL VAL MBOWlowL VAL HAMPL VAL YupR VAL YlowR VAL MBOWupR VAL MBOWlowR VAL MBOWlowR VAL MBOWlowR VAL UP Y VAL LOW Y	(0, 63) (0, 1) (0, 63) (0, 1)	63 0 30 0 31 0 31 0 32 0 37 0 30 0 30 0 32 0 32 0 32 0 31 0 31 0 31
VAL H STAT	(0, 63) (0, 1)	33 0
	` ' '	0 33 0 34 0 19

IF ADJUST			
Automute		1	
Audio Gain		0	
L Gating		0	
AGC TOP	(-16, +15)		-6

SERVICE		
SUB COL SUB HUE SUB SHARP SUB BRIGHT SUB CONT R-DRIVE G-DRIVE B-DRIVE R CUTOFF G CUTOFF B CUTOFF B CUTOFF Br TXT Br OSD	(0, 63) (0, 63) (0, 63) (0, 63) (0, 15) (0, 63) (0, 63) (0, 63) (0, 63) (0, 63) (0, 15) (0, 15)	Adj 31 30 13 12 50 Adj Adj 28 24 46 7

DAC			
CONFIG MPIN CONT HLIN HTRAP ROT. COIL PHOCUS PH	(0, 255) (0, 255) (0, 255) (0, 255) (0, 255)	00000000	96 83 127 130 90

sou	ND			
M-N		(0, 511)		200
M-D		(-128, -1)		-20
M-S		(+0, +127)		+20
S-M		(+0, +127)		+10
D-M		(-128, -1)		-10
N-M		(0, 1023)		496
BBE		(+0, +68)		+28
B1		(-96, +96)		+0
B2		(-96, +96)		+0
B3		(-96, +96)		+0
B4		(-96, +96)		+0
B5		(-96, +96)		+0
SW L		(-128, +0)		+0
SW F		(+5, +40)		+30
NICA	M C AD		00000	
NICA	M Error	(0, 2047)		0
Stere	0	(-128, +127)		+0
Statu	s	0000	000110	

ERROR MENU			
E02 E03 E04 E05 E06 E07 E08 E09 E10 E11 E12 E13 E14	OCP OVP VSYNC IKR IIC NVM HPROT TUNER SOUNDP - SCANRATE DAC BACKEND DYN CON	(0, 255) (0, 255)	0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0
E16	PIP	(0, 255)	ō
WORKING TIME HOURS MINUTES			14 7

## **Sub Brightness Adjustment**

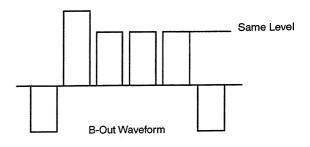
- 1. Input a Monoscope pattern.
- 2. Set the TV set or operation in Service Mode. [See Page 21].
- Select 'Service' from the on screen menu display and press 'Right Arrow'.
- 4. The 'Service' menu will appear on the screen.
- 5. Adjust the 'Sub-Brightness' data so that there is barely a difference between the 0 IRE and 10 IRE signal levels.

## **Sub Contrast Adjustment**

- 1. Input a video signal that contains a small 100% white area on a black background.
- 2. Connect an digital voltmeter to Pin 10 of J7375 [C Board].
- 3. Set the TV set or operation in Service Mode. [See Page 21].
- 4. Select 'Service' from the on screen menu display and press 'Right Arrow'.
- 5. The 'Service' menu will appear on the screen.
- 6. Adjust the Sub-Contrast to obtain a voltage of 105 +/- 5V.

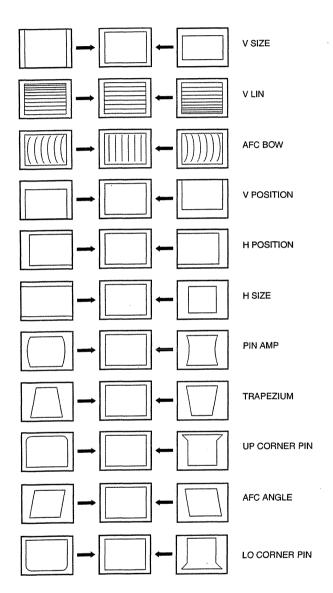
## Sub Colour Adjustment

- 1. Receive a PAL colour bar signal.
- 2. Connect an oscilloscope to Pin 6 of CN7001 [A Board].
- 3. Set the TV set or operation in Service Mode. [See Page 21].
- 4. Select 'Service' from the on screen menu display and press 'Right Arrow'.
- 5. The 'Service' menu will appear on the screen.
- 6. Adjust the 'Sub Colour' so that the Cyan, Magenta and Blue colour bars are of equal levels as indicated below.



## **Deflection System Adjustment**

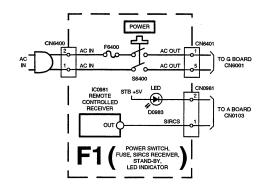
- 1. Set the TV set or operation in Service Mode. [See Page 21].
- 2. Select 'Geometry' from the on screen menu display and press 'Right Arrow'.
- 3. The 'Geometry' menu will appear on the screen.[See Page 21]
- 4. Select and adjust each item in order to obtain the optimum image.

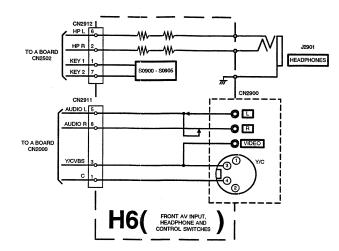


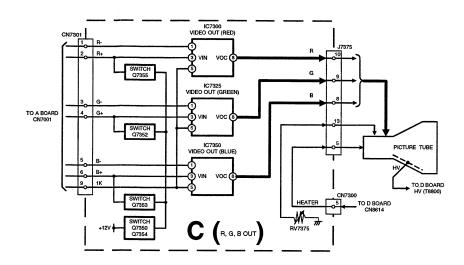
## 4-2.TEST MODE 2:

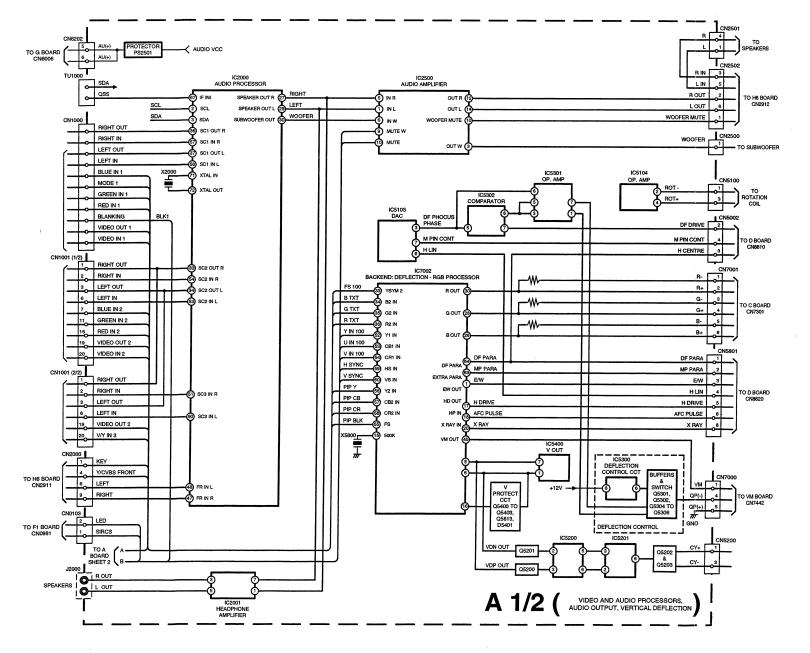
Test Mode 2 is available by setting the TV for operation in Service Mode [ As shown on Page 21 ] , OSD 'TT' appears. The functions described below are available by selecting the two numbers. To release the 'Test mode 2', press 00, 10, 20 ... twice or switch the TV set into Stand-by mode. In 'TT Menu' mode, it is possible to remove the Menu from the screen by pressing the Speaker Off button once. Pressing the Speaker OFF button a second time will cause the Menu to reappear. The function is kept even when the menu is not displayed on screen !!.

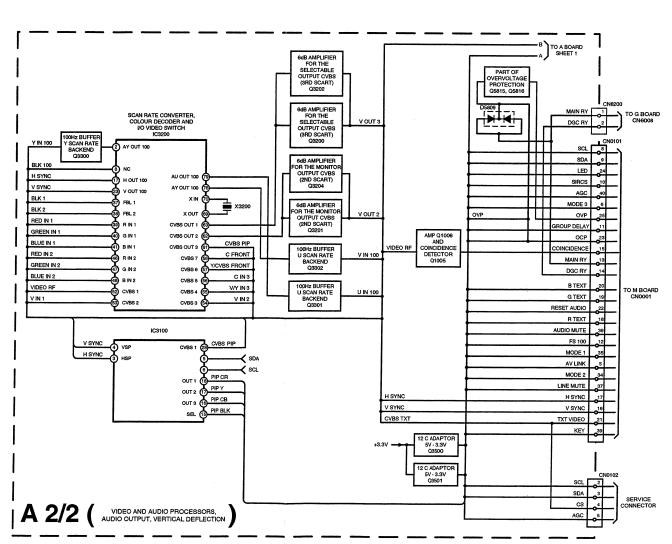
00	'TT' mode off			
01	Picture maximum			
02	Picture minimum			
03	Set speaker/headphone Volume to 35%			
04	Set speaker/headphone Volume to 50%			
05	Set speaker/headphone Volume to 65%			
06	Set speaker/headphone Volume to 80%			
07	Ageing mode			
80	Shipping Condition			
11	Sub picture adjustment			
12	Sub colour adjustment			
13	Sub Brightness adjustment			
14	Text H Position adjustment			
15	Rotation Coil Test			
16	Picture level 50%			
19	Factory Mode Enable/Disable			
21	Destination ADEKR			
22	Destination BL			
23	Destination ADEKR			
24	Destination U			
25	Destination ADEKR			
26	Destination BL			
27	Destination ADEKR			
28	Destination ADEKR			
31	Auto Shutoff Enable/Disable			
36	Velocity Modulation (VM) OFF/ON test			
41	Re-initialise NVM			
43	Select Dual A sound			
44	Select Dual B sound			
45	Select Mono sound			
46	Select Stereo sound			
48	Set NVM as non virgin			
49	Set NVM as virgin			
53	FM Overmodulation Enable/Disable			
55	Tuner selection (SONY/ALPS)			
59	Select Model 3 Scarts + PIP or 2 Scarts			
68	Enable/Disable X26 countermeasure (N problem)			
73	Enable Zweiton D/K2 system (6.5/6.74)			
74	Enable Zweiton D/K3 system (6.5/5.74)			
78	Balance full right			
79	Balance full left			
87	Local keys test			
99	Display Error and Working Time menu			
,				

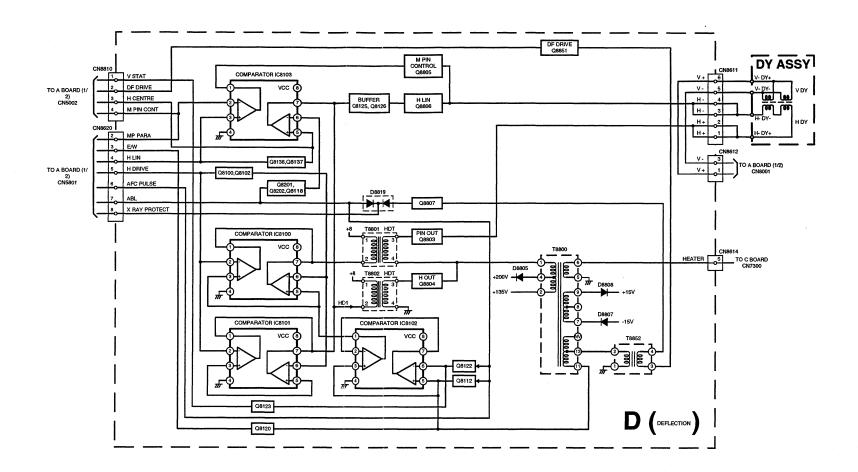


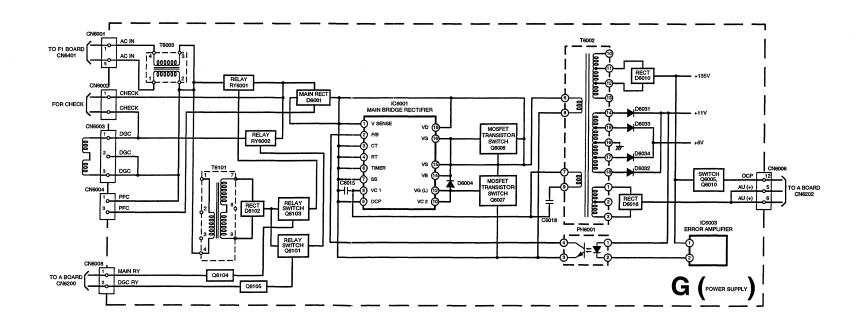




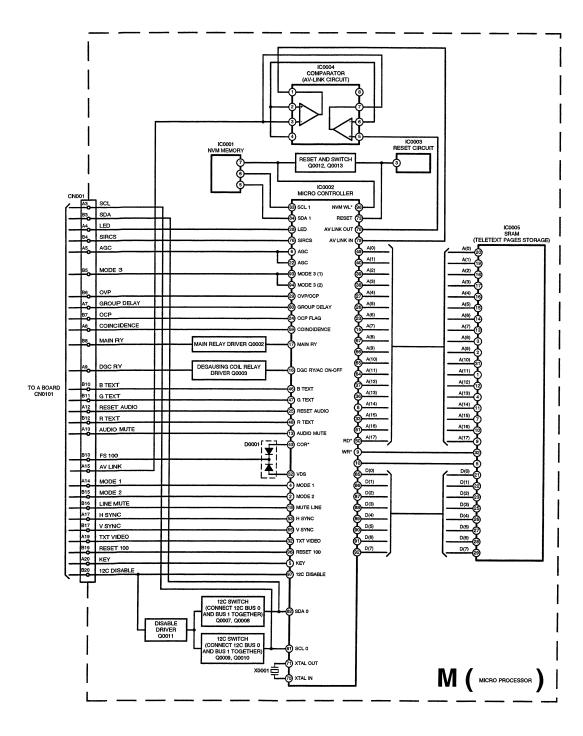


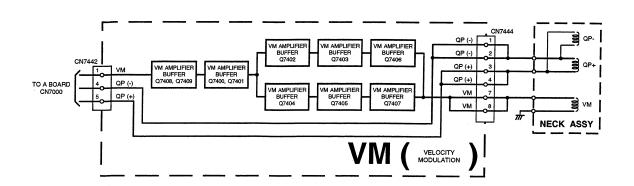




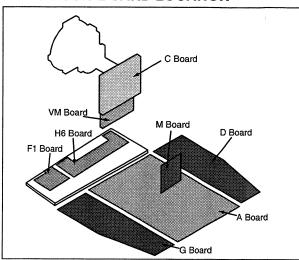


## 5-1. BLOCK DIAGRAMS (3)





## 5-2. CIRCUIT BOARD LOCATION



## 5-3. SCHEMATIC DIAGRAMS AND PRINTED WIRING BOARDS

## Note:

- All capacitors are in μF unless otherwise noted.
   pF : μμF 50WV or less are not indicated except for electrolytic types.
- Indication of resistance, which does not have one for rating electrical power, is as follows.

Pitch: 5mm Electrical power rating: 1/4W

- Chip resistors are 1/10W
- All resistors are in ohms.

k = 1000 ohms, M = 1000,000 ohms

: nonflammable resistor.

: fusible resistor.

: internal component.

: panel designation or adjustment for repair.

All variable and adjustable resistors have

- characteristic curve B, unless otherwise noted.
- All voltages are in Volts.
- Readings are taken with a 10Mohm digital mutimeter.
- Readings are taken with a color bar input signal.
- Voltage variations may be noted due to normal production

: B + bus.

: B - bus.

: RF signal path.

: earth - ground.

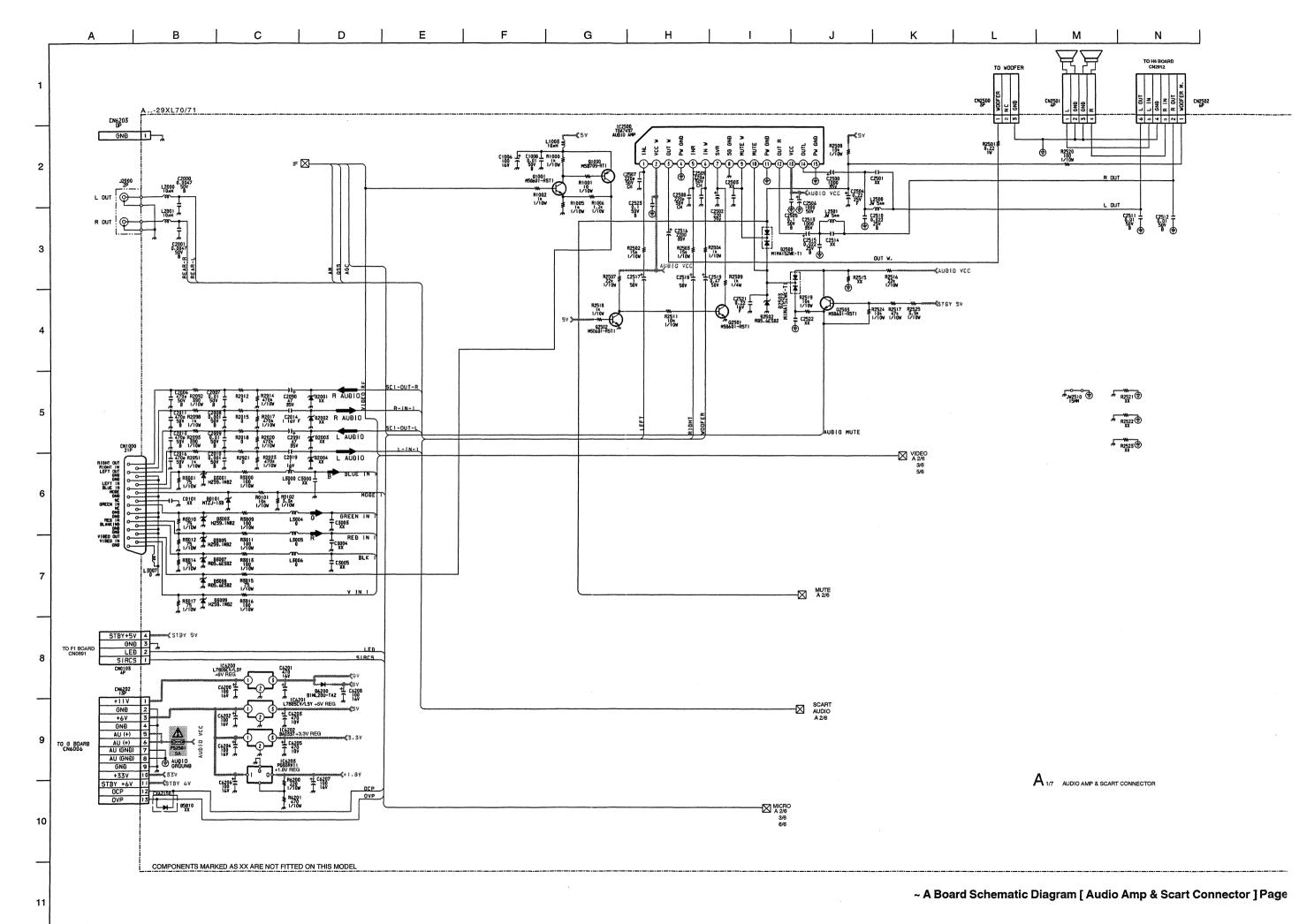
: earth - chassis

## **Reference Information**

RESISTOR	RN	: METAL FILM
	RC	: SOLID
	FPRD	: NON FLAMMABLE CARBON
	FUSE	: NON FLAMMABLE FUSIBLE
	RS	: NON FLAMMABLE METAL OXIDE
	RB	: NON FLAMMABLE CEMENT
	RW	: NON FLAMMABLE WIREWOUND
'	<b>※</b>	: ADJUSTMENT RESISTOR
COIL	LF-8L	: MICRO INDUCTOR
CAPACITOR	TA	: TANTALUM
	PS	: STYROL
	PP	: POLYPROPYLENE
	PT	: MYLAR
·	MPS	: METALIZED POLYESTER
	MPP	: METALIZED POLYPROPYLENE
	ALB	: BIPOLAR
	ALT	: HIGH TEMPERATURE
	ALR	: HIGH RIPPLE

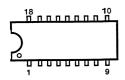
Note: The components identified by shading and marked  $\Delta$  are critical for safety. Replace only with the part numbers specified in the parts list.

Note: Les composants identifiés par une trame et par une marque  $\Delta$  sont d'une importance critique pour la sécurité. Ne les remplacer que par des pièces de numéro spécifié. specified.



## 5-4. SEMICONDUCTORS

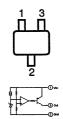
CXAB070AP MCZ3001D



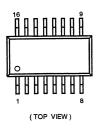
LM318P LM358N LM393DT LM393N M24C16-MN6T(A)



PST573IMT



CXA1875AM-T4



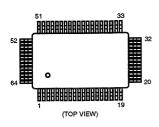
LM78L05ACZ



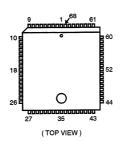
SAA5665HL/M1D/0358



CXA2100AQ-TL



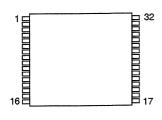
MSP3411G-QA-B10



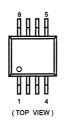
SBX3081-51(30)



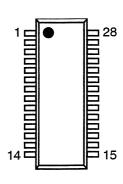
K6T2008V2A-YF70T00



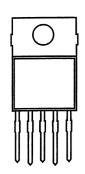
NJM3404AD-W UPC4558G2



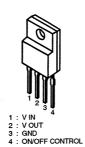
SDA9488X-B23GEG



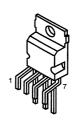
LA6500-FA



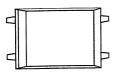
PQ30RV11



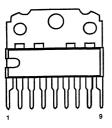
STV9379



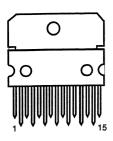
## **TCET1103G**



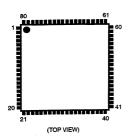
TDA6111Q/N4



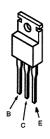
TDA7497



VPS9402-A32GEG



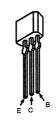
BA12T BAO33T IRF614-005 IRF620 SPA07N60C2 2SA2005 2SC5511



DTA144EK DTC144TKA-T146 2SA1162-G



DTA144ESA 2SA933AS-QT 2SC2785-HFE



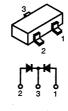
L7809CV/LSY STP5NB40FP STP5NB40(030Y) 2SC5698-CA 2S5696-SONY-CA



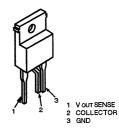
MSB709-RT1 MSD601-RST1 M1MA152WA-T1 UN2111 UN213 2SK2036(TE85L)



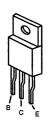
RB705D



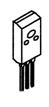
SE135N-LF4



2SA1837(LBS2S0N)



2SB734-34



2SC2688(5)-LK



BAS216



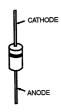
BAS316-115 MMDL914T1 UDZSTE-176.2B



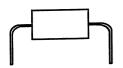
BYV98-200-RAS 15/12



D1NL20U EGP20G EL1Z GP08D UF4005PKG23



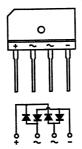
D2S4MTA1



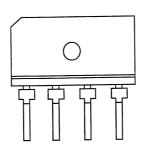
MTZJ-T-77-22 ERA38-06 ERA85-009 HZS9.1NB2 MTZJ-13B MTZJ-33B MTZJ-3.6A MTZJ-4.7C

RD15ES-B2 RD39ES-B2 RD5.6ESB2 1SS119-25 1SS133T-77

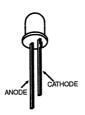


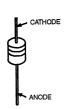


GS1B460/45



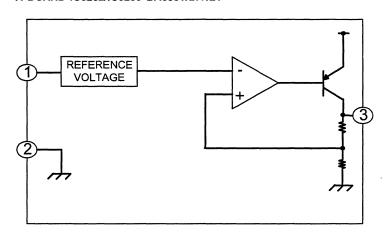
TLHK5190



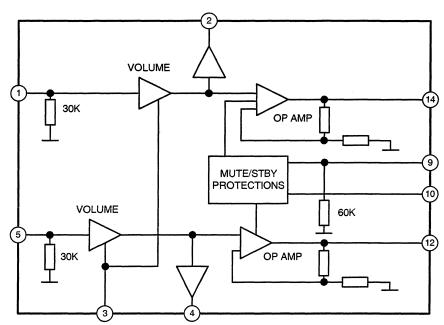


## 5-5 IC BLOCK DIAGRAMS

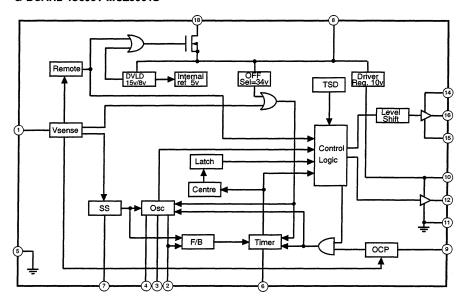
## A BOARD IC6202/IC6205 BA033T/BA12T



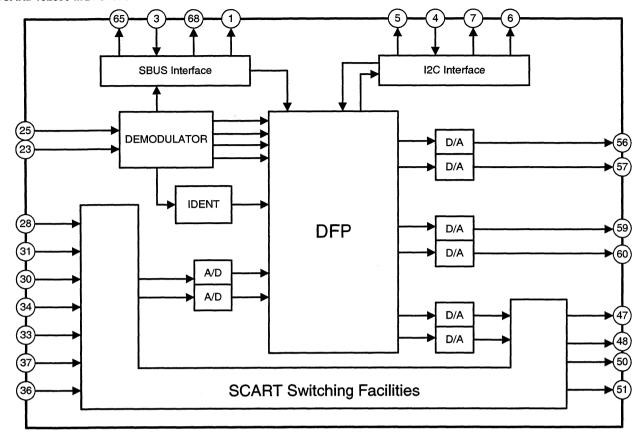
## **A BOARD IC2500 TDA7497**



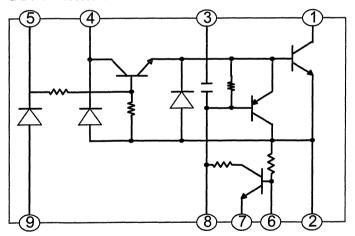
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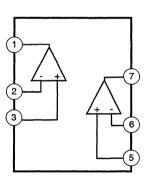
## A BOARD IC2000 MSP3411G



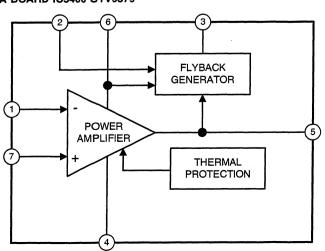
## G BOARD IC6003 SE135N-LF4



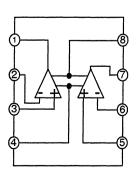
## A BOARD IC5301/IC5302 LA6393DLL



## **A BOARD IC5400 STV9379**



## A BOARD IC5300 LM358N



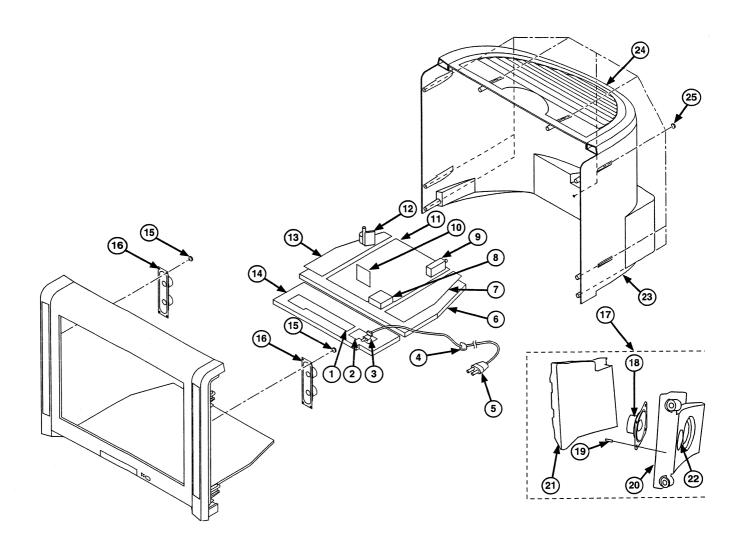
## SECTION 6 EXPLODED VIEWS

## NOTE:

- Items with no part number and no description are not stocked because they are seldom required for routine service
- The construction parts of an assembled part are indicated with a collation number in the remarks column.
- 6-1. CHASSIS

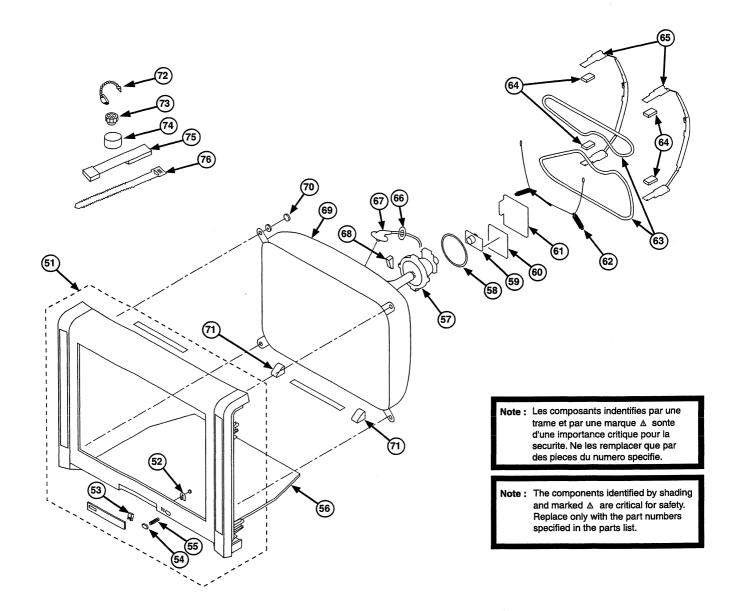
Items marked "\*" are not stocked since they are seldom required for routine service. Some delay should be anticipated when ordering these items. Note: Les composants indentifies par une trame et par une marque ∆ sonte d'une importance critique pour la securite. Ne les remplacer que par des pieces du numero specifie.

Note: The components identified by shading and marked △ are critical for safety. Replace only with the part numbers specified in the parts list.



REF.NO.	PART.NO	DESCRIPTION	REMARK	REF.NO.	PART.NO	DESCRIPTION	REMARK
1	*A-1055-452-A	H6 BOARD COMPLET	<b>'E</b>	14	*4-103-134-01	BRACKET, H	
2	*A-1055-970-A	F1 BOARD, COMPLE	TE	15	4-058-870-01	SCREW (4x16)W(+)P	TAPPING
3 A	1-571-433-21	SWITCH, PUSH (AC	POWER)	16	1-529-408-11	SPEAKER (4.2x24CM)	
4	*4-202-531-01	AC CORD LOCK (SO	3)	17	A-1606-689-A	WOOFER COMPLETE AS	SY 18 - 22
5 Δ	*1-823-853-11	CORD. POWER		18	1-910-000-50	WOOFER LS	
6	*4-206-106-06	BRACKET, MAIN		19	7-685-663-71	SCREW +BVTP 4x16 T	YPE2 IT-3
7	A-1637-024-A	G BOARD, COMPLET	E	20	*4-102-535-01	WOOFER BAFFLE	
8	1-424-855-11	COIL, CHOKE 29MM	OH.	21	*4-102-534-01	WOOFER BOX	
9.	8-598-623-10	TUNER FSS BTP-AC	:421	22	*4-102-533-01	WOOFER PORT	
10	*A-1634-062-A	M BOARD, COMPLET	E	23	4-103-130-01	REAR COVER	
11	*A-1632-952-A	A BOARD, COMPLET	TE	24	4-103-136-01	29 LOOP PAINTED	
12 A			FLYBACK (NX-4522//Z2B4)	25	7-685-663-71	SCREW +BVTP 4x16 T	YPE2 IT-3
13	*A-1640-432-A	D BOARD, COMPLET	***************************************				

## 6-2. PICTURE TUBE



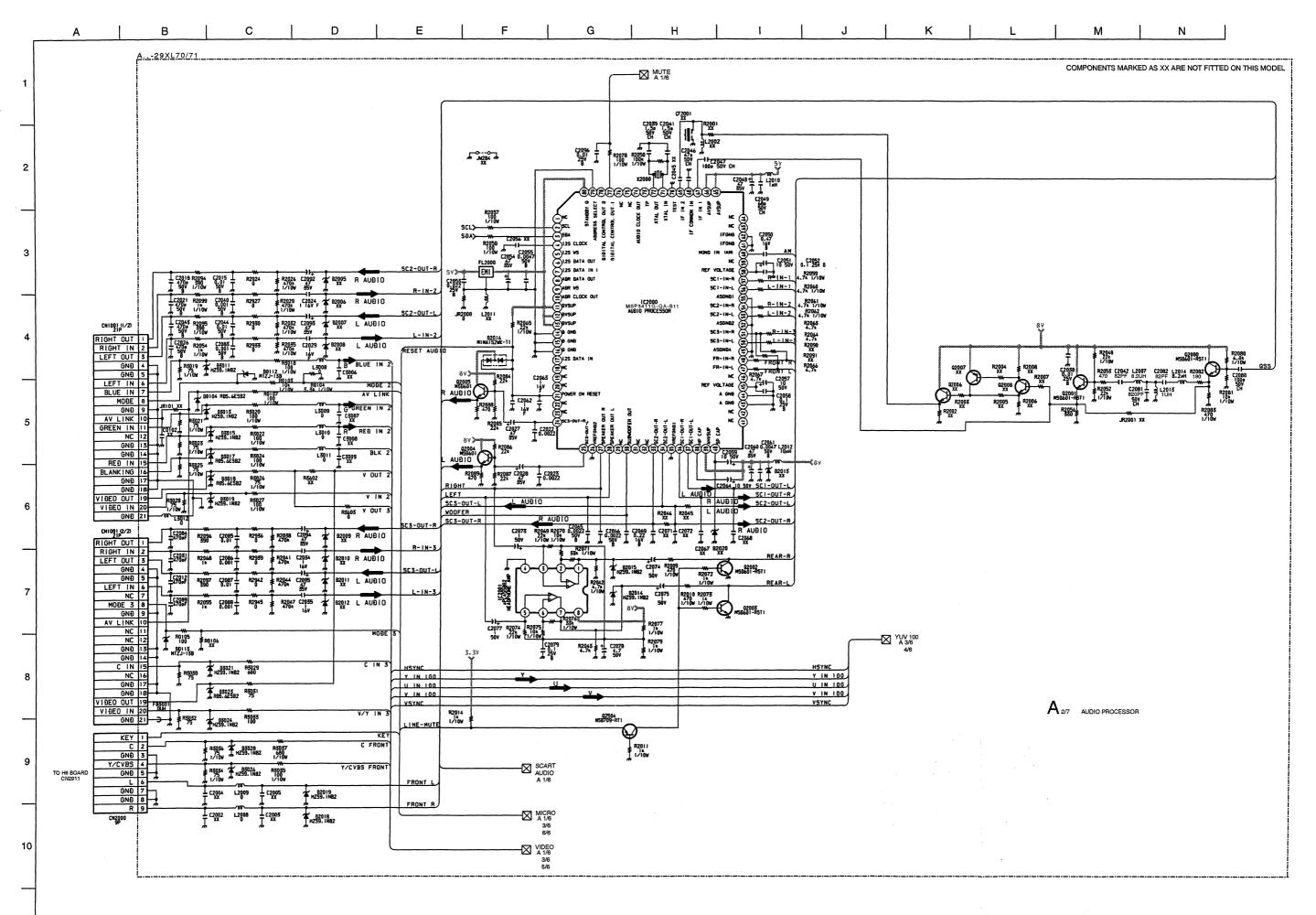
REF.NO.	PART.NO	DESCRIPTION	REMARK	REF.NO.	PART.NO	DESCRIPTION	REMARK
51	x-2021-299-1	BEZNET ASSY	52-55	64	*4-203-390-11	CUSHION, DGC	
52	4-205-375-01	GUIDE, LIGHT		65	*4-204-768-02	HOLDER, DGC (29")	
53	4-087-491-11	SPRING (DOOR)		66	4-202-554-02	HOLDER, HV CABLE	
54	4-102-532-01	POWER BUTTON		<b>6</b> 7 △	1-251-946-11	CAP ASSY, HIGH-VO	OLTAGE
55	4-204-426-01	SPRING		68	3-704-495-03	SPACER, DY	
56	*4-103-133-01	CHASSIS BRACKET		69 △	8-735-097-05	PICTURE TUBE (M6	BINEO 60X)
<b>5</b> 7 △	8-451-504-31	DEFLECTION YOKE	(Y29RSC-5)	70	4-046-765-12	SCREW, TAPPING 7-	HCROWN WASHER
58	1-452-896-11	COIL, NA ROTATIO	N (RT200)	71	*4-206-160-01	SUPPORT CRT	
59 △	8-453-021-21	NECK ASSY, (NA-2	919-M2)	72	4-308-870-00	CLIP, LEAD WIRE	
60	*A-1300-626-A	VM BOARD, COMPLE	TE	73	1-452-094-00	MAGNET, ROTATABLE	E DISK; 15MM Ø
61	*A-1055-968-A	C BOARD, COMPLET	3	74	1-452-032-00	MAGNET, DISK; 10	MM Ø
62	4-369-318-21	SPRING, TENSION		75	X-4387-214-1	PERMALLOY, CORREC	CTION
63 A	1-424-888-11	COIL, DEGAUSSING		76	3-701-007-00	BAND, BINDING	

## SECTION 7 **ELECTRICAL PARTS LIST**

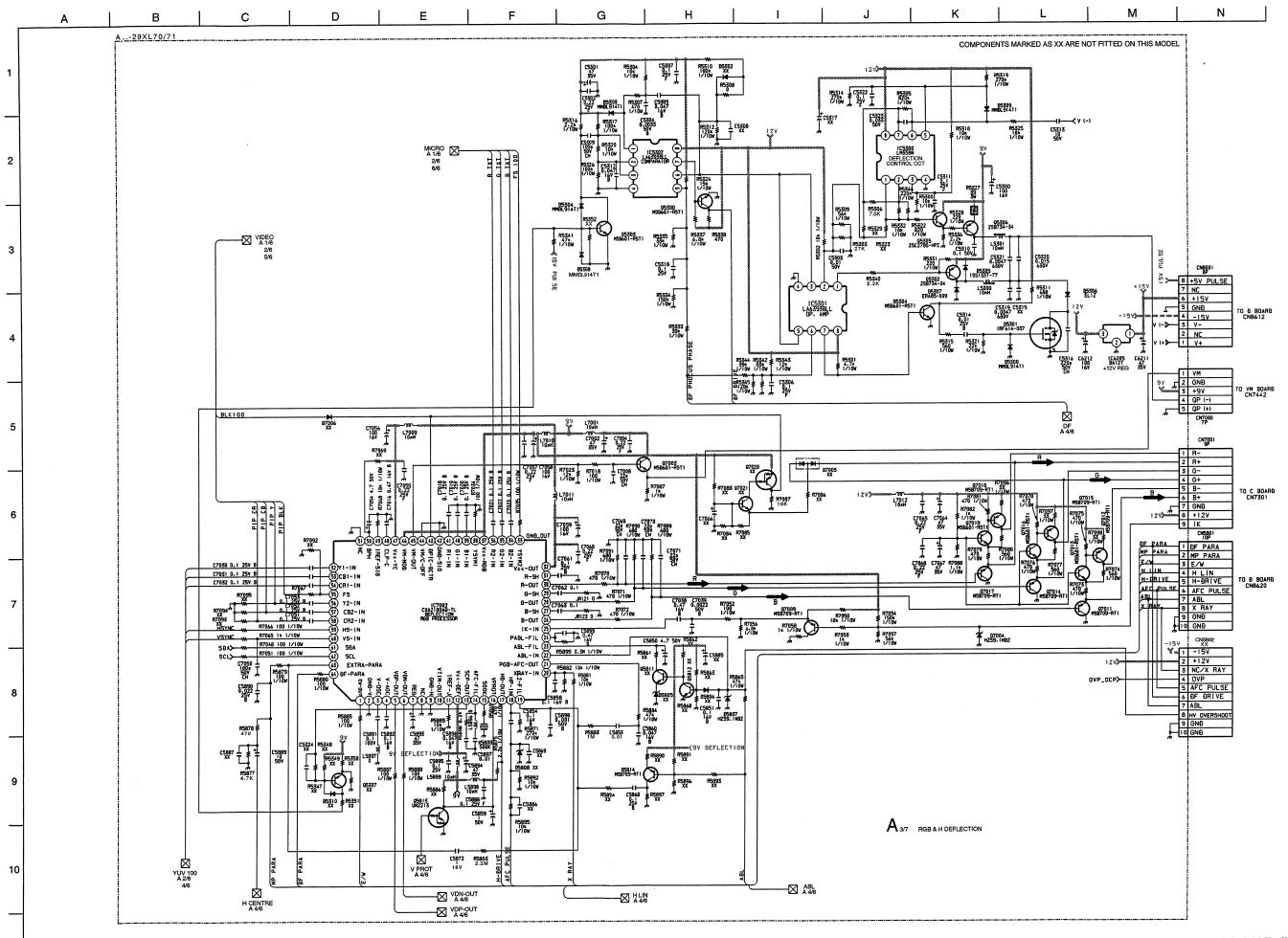
## PARTS LISTING TABLE OF CONTENTS

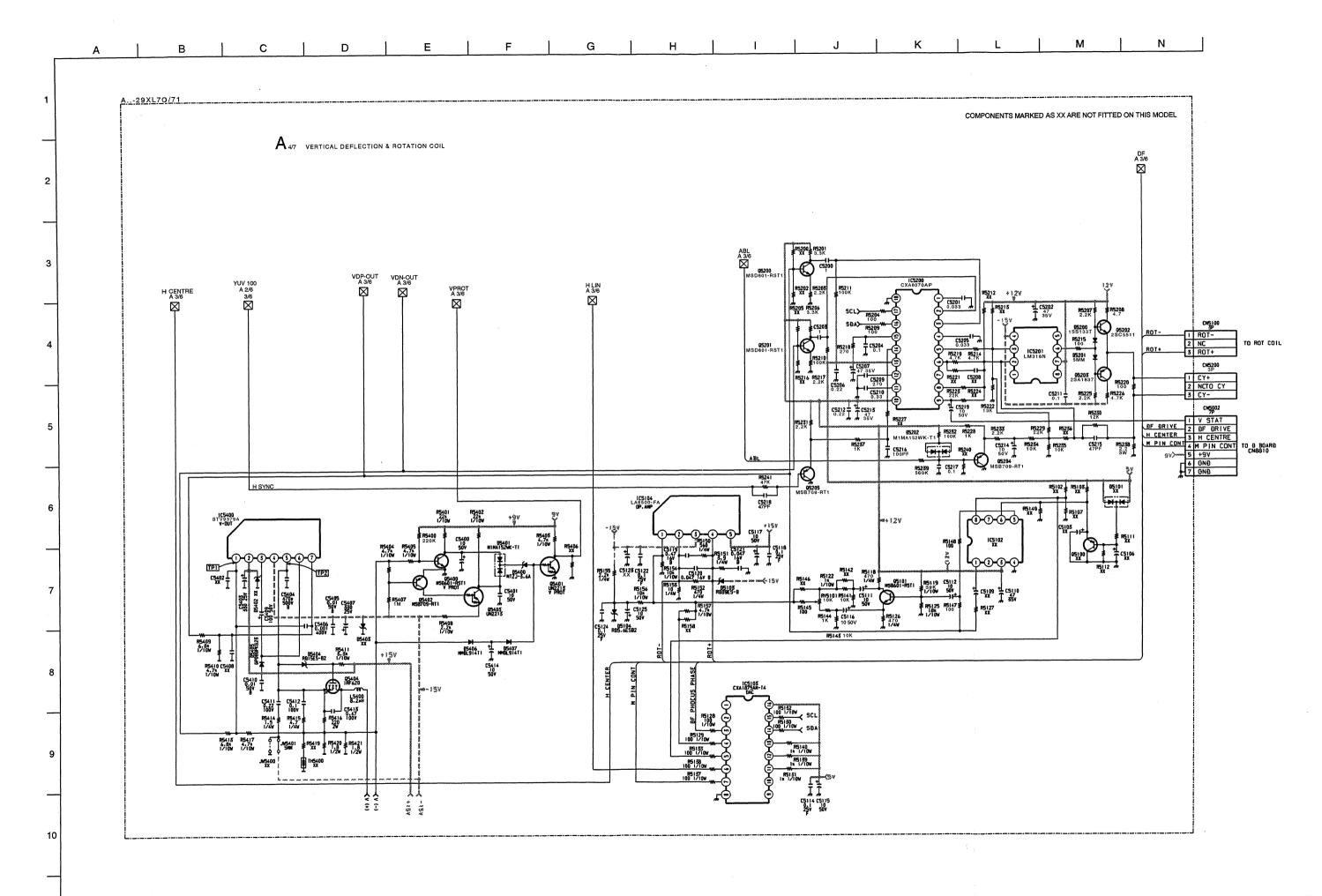
		<u>Page</u>
		53
H6 BOARD COMPLETE Parts List:		53
C BOARD COMPLETE Parts List:		54
F1 BOARD COMPLETE Parts List:		<b>5</b> 5
A BOARD COMPLETE Parts List:		65
M BOARD COMPLETE Parts List:		. 66
G BOARD COMPLETE Parts List:		. 68
D BOARD COMPLETE Parts List:		. 72
VM BOARD COMPLETE Parts List:		. 73
THE PARTICULE !	ALS:	73
ACCESSORIES AND PACKAGING MATERI REMOTE COMMANDER:	ALS:	. 73

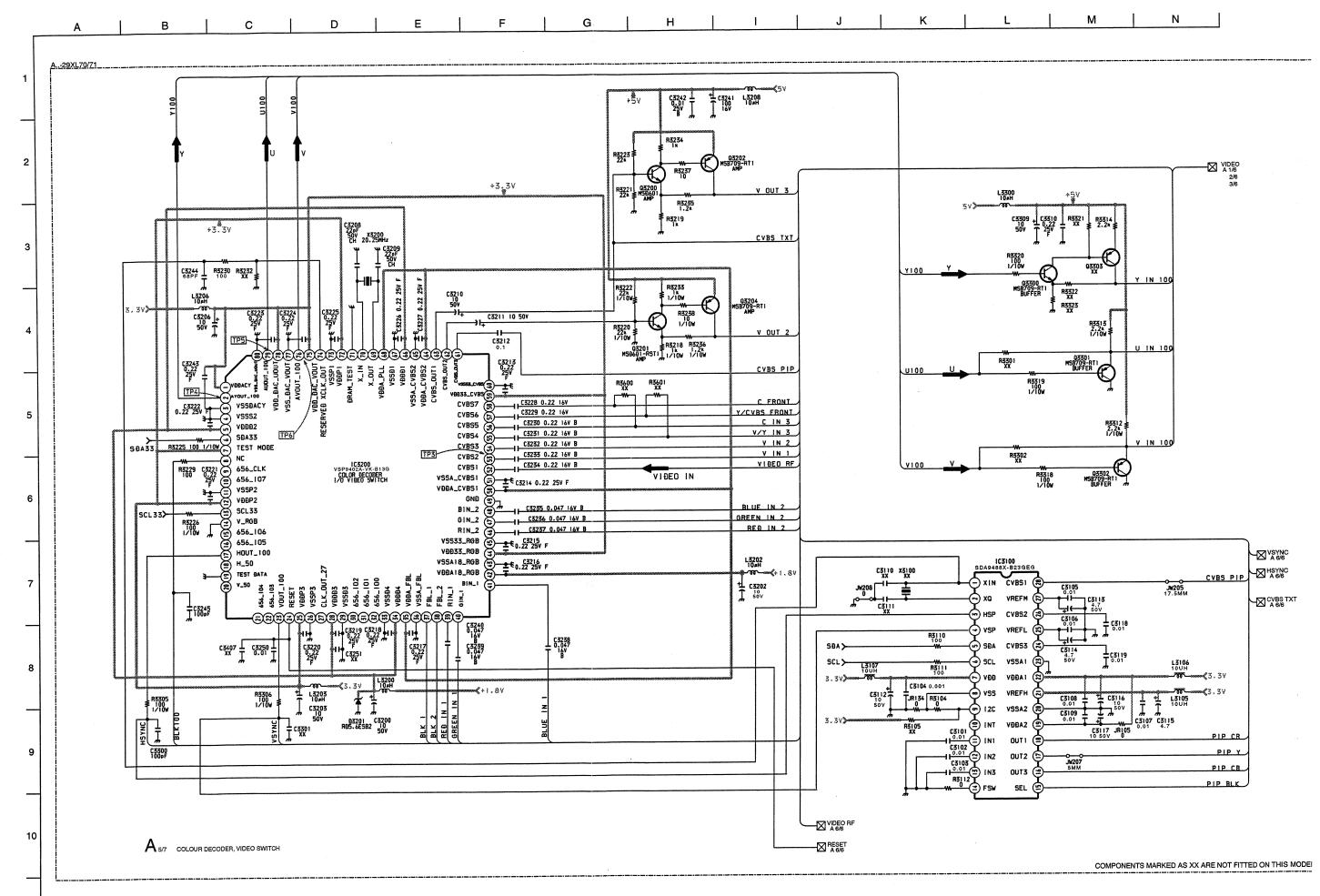
Note: Items marked "\*" are not stocked since they are seldom required for routine service. Some delay should be anticipated when ordering these items. Parts indicated (XX) on the Schematic Diagram are not used in this model and therefore do not appear in the Parts List.

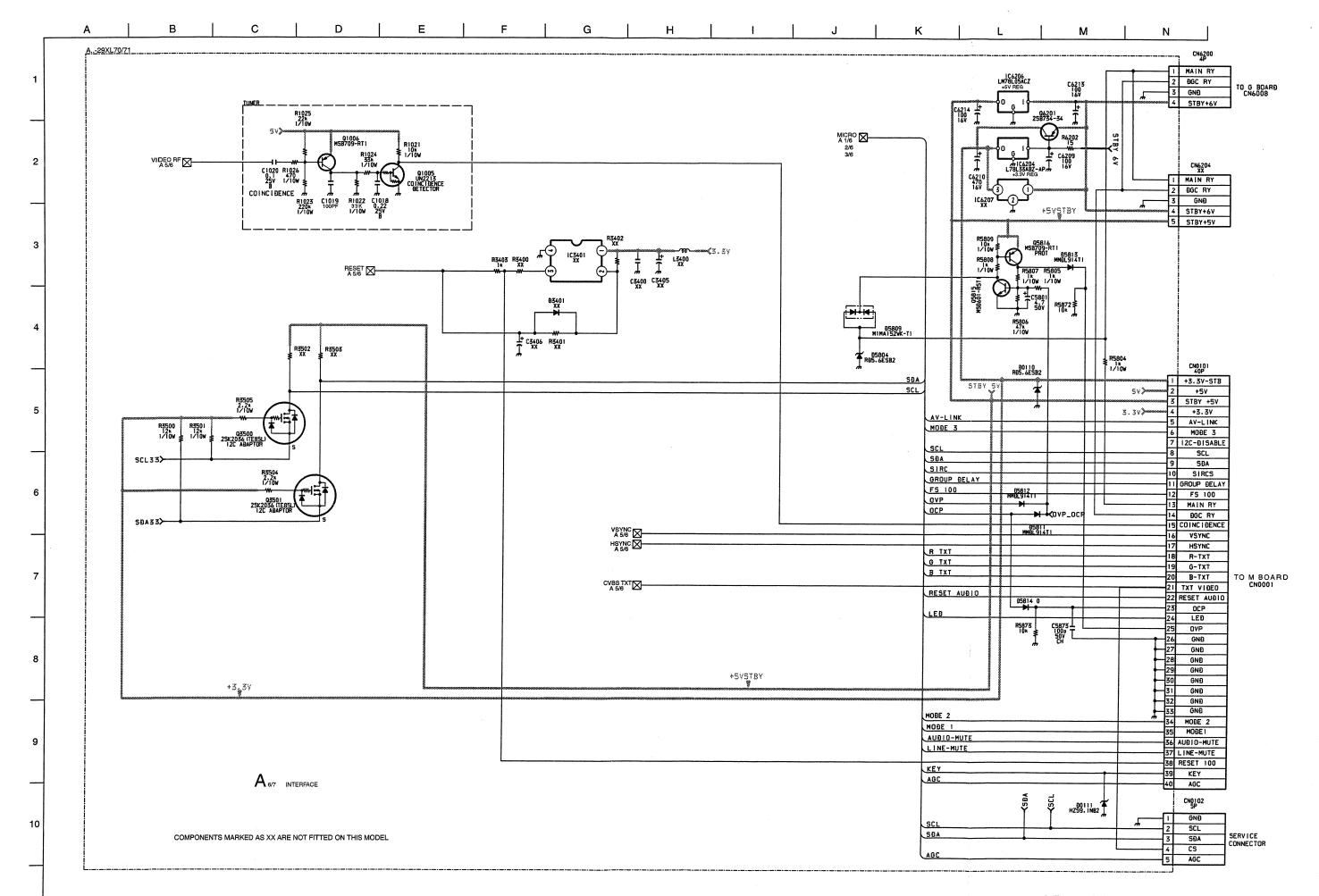


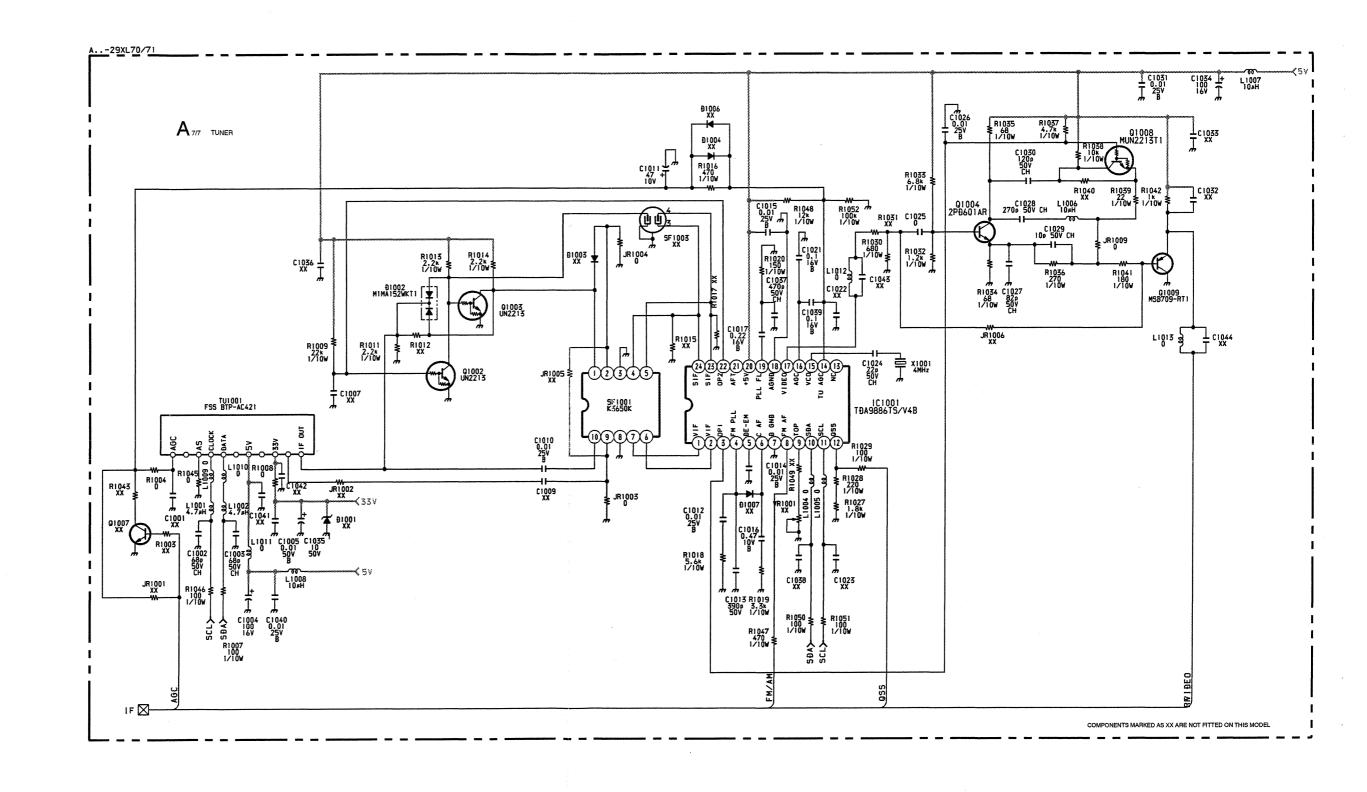
11



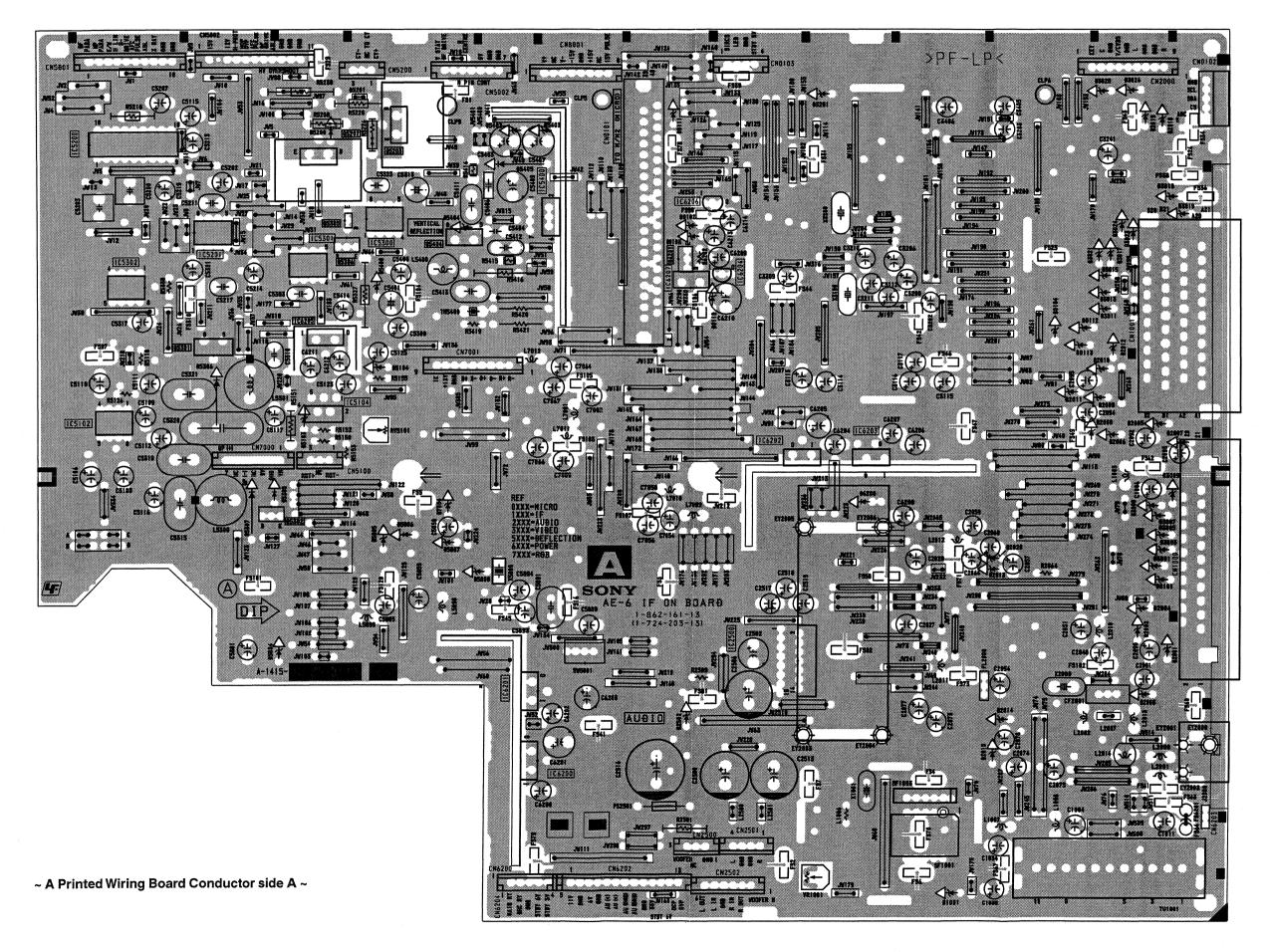








A | B | C | D | E | F | G | H | I | J | K | L | M | N



~ A Printed Wiring Board Conductor sic

# ~ A Board IC Voltage Table ~

	IC Voltage Table													
Ref No	Pin No	Voltage (V)	Ref No	Pin No	Voltage (V)	Ref No	Pin No	Voltage (V)	Ref No	Pin No	Voltage (V)	Ref No	Pin No	Voltage (V)
	1	1.3		6	1.8		5	9.3	IC5400	6	13.7		32	8.9
	2	1.7		7	2		6	0.5	105400	7	1.4		33	0
	3	2.6		8	0	IC5201	7	12.1		1	3.6		34	4.7
	4	0		9	3.1		8	-14.1		2	0		35	4.7
	5	2.5		10	3		1	6		3	4.4		36	4.7
	6	3.3	IC5103	11	5		2	6		4	4.8		37	8.9
	7	0		12	5		3	6		5	3.5		38	0
	8	0		13	5		4	0		6	3.4		39	4.8
	9	1.1		14	0	IC5300	5	6		7	7.6		40	4.8
	10	1.1		15	0		6	6		8	0		41	4.8
	11	0		16	5		7	6		9	0		42	0
	12	0		1	4.8		8	12		10	0.4		43	0
	13	0		2	4.9		1	1.7		11	1.8		44	0
	14	0		3	4.8		2	8.5	1	12	0.4		45	6.3
IC3100	15	0.5		4	4.8		3	6.5	1	13	0.9		46	8.9
	16	0.3		5	5	Innes	4	0		14	5	107000	47	8.9
	17	0.3		6	5	IC5301	5	6.5	1	15	2.5	IC7002	48	6
	18	0.3		7	5		6	7.1	IC7002	16	0		49	2.5
	19	3.3		8	5		7	0.4		17	3		50	4.1
	20	0		9	4.9		8	12	1	18	2.7		51	0
	21	3.3	IC5200	10	12.1		1	0	1	19	3.9		52	6
	22	3.3		11	4.1		2	5.8	1	20	0	1	53	5.8
	23	0		12	5		3	6.3		21	6.1		54	5.8
	24	3.2	1	13	5		4	0	1	22	2.7		55	0.4
	25	1.2		14	1.9	IC5302	5	6.6		23	8.8		56	5.8
	26	3.2	1	15	1.1		6	6.5	1	24	0		57	5.8
	27	2.1	1	16	0		7	0.4		25	4.3		58	5.8
	28	0.3		17	0		8	12		26	3.2		59	0.3
	1	3.3	1	18	0		1	1.4		27	5.2		60	0
	2	3.3		1	9.3		2	13.2		28	0.3		61	0
IC5103	3	1.9	1	2	3.8	IC5400	3	-12.5		29	4.9		62	2.9
	4	2.6	IC5201	3	3.8		4	-15.4		30	3.4		63	3.7
	5	2.5	1	4	-15.4		5	-0.4	]	31	5.6			

# ~ A Board Location Table (A Side) ~

D2014	K-9	D3005	M - 7	D3017	M - 4	D3028	M - 2	D5306	C - 5	D7004	F-7	IC5301	D - 4	IC6206	H-3
D2015	K-9	D3007	M - 7	D3018	N - 3	D3201	J - 2	D5307	C-6	D5809	K-8	IC5302	B - 4	IC6207	H - 4
	M - 2	D3008	M - 7	D3019	N - 3	D5103	D - 6	D5400	E - 4	- 1	C	IC5400	G - 4	TRANS	SISTOR
		D3009	N - 7	D3021	M - 4	D5104	E - 5	D5404	F-3	IC5104	D-6	IC6201	G - 10	Q5202	E-2
		D3011	M - 4	D3023	M - 4	D5200	D - 2	D5405	F-3	IC5200	B - 3	IC6202	1-6	Q5301	C-5
		1	M - 4	D3024	M - 4	D5201	E-2	D5807	F-7	IC5201	C - 4	IC6203	J-6	Q5306	E-4
			M - 4	D3026	M - 2	D5305	D - 6	D6200	J-6	IC5300	E-4	IC6205	D - 5	Q5404	F-4
20000															
:	D2015 D2018 D2019 D2502 D3001	D2015 K-9 D2018 M-2 D2019 M-2 D2502 H-9 D3001 M-7	7 D2015 K - 9 D3007 D2018 M - 2 D3008 D2019 M - 2 D3009 D2502 H - 9 D3011 D3001 M - 7 D3013	D2015 K-9 D3007 M-7 D2018 M-2 D3008 M-7 D2019 M-2 D3009 N-7 D2502 H-9 D3011 M-4 D3001 M-7 D3013 M-4	D2015 K - 9 D3007 M - 7 D3018 D2018 M - 2 D3008 M - 7 D3019 D2019 M - 2 D3009 N - 7 D3021 D2502 H - 9 D3011 M - 4 D3023 D3001 M - 7 D3013 M - 4 D3024	D2015 K-9 D3007 M-7 D3018 N-3 D2018 M-2 D3008 M-7 D3019 N-3 D2019 M-2 D3009 N-7 D3021 M-4 D2502 H-9 D3011 M-4 D3023 M-4 D3001 M-7 D3013 M-4 D3024 M-4	D2015 K - 9 D3007 M - 7 D3018 N - 3 D3201 D2018 M - 2 D3008 M - 7 D3019 N - 3 D5103 D2019 M - 2 D3009 N - 7 D3021 M - 4 D5104 D2502 H - 9 D3011 M - 4 D3023 M - 4 D5200 D3001 M - 7 D3013 M - 4 D3024 M - 4 D5201	D2015 K-9 D3007 M-7 D3018 N-3 D3201 J-2 D2018 M-2 D3008 M-7 D3019 N-3 D5103 D-6 D2019 M-2 D3009 N-7 D3021 M-4 D5104 E-5 D2502 H-9 D3011 M-4 D3023 M-4 D5200 D-2 D3001 M-7 D3013 M-4 D3024 M-4 D5201 E-2	D2015 K-9 D3007 M-7 D3018 N-3 D3201 J-2 D5307 D2018 M-2 D3008 M-7 D3019 N-3 D5103 D-6 D5400 D2019 M-2 D3009 N-7 D3021 M-4 D5104 E-5 D5404 D2502 H-9 D3011 M-4 D3023 M-4 D5200 D-2 D5405 D3001 M-7 D3013 M-4 D3024 M-4 D5201 E-2 D5807	D2015 K-9 D3007 M-7 D3018 N-3 D3201 J-2 D5307 C-6 D2018 M-2 D3008 M-7 D3019 N-3 D5103 D-6 D5400 E-4 D2019 M-2 D3009 N-7 D3021 M-4 D5104 E-5 D5404 F-3 D2502 H-9 D3011 M-4 D3023 M-4 D5200 D-2 D5405 F-3 D3001 M-7 D3013 M-4 D3024 M-4 D5201 E-2 D5807 F-7	D2014 K-9 D3007 M-7 D3018 N-3 D3201 J-2 D5307 C-6 D5809  D2018 M-2 D3008 M-7 D3019 N-3 D5103 D-6 D5400 E-4  D2019 M-2 D3009 N-7 D3021 M-4 D5104 E-5 D5404 F-3 IC5104  D2502 H-9 D3011 M-4 D3023 M-4 D5200 D-2 D5405 F-3 IC5200  D3001 M-7 D3013 M-4 D3024 M-4 D5201 E-2 D5807 F-7 IC5201	D2014 K-9 D3005 M-7 D3017 M-4 D3021 M-2 D5307 C-6 D5809 K-8  D2018 M-2 D3008 M-7 D3018 N-3 D5103 D-6 D5400 E-4  D2019 M-2 D3009 N-7 D3021 M-4 D5104 E-5 D5404 F-3 IC5104 D-6  D2502 H-9 D3011 M-4 D3023 M-4 D5200 D-2 D5405 F-3 IC5200 B-3  D3001 M-7 D3013 M-4 D3024 M-4 D5201 E-2 D5807 F-7 IC5201 C-4	D2015 K-9 D3007 M-7 D3018 N-3 D3010 J-2 D5307 C-6 D5809 K-8 IC5302 D5019 M-2 D3008 M-7 D3019 N-3 D5103 D-6 D5400 E-4 IC D5400 D5502 H-9 D3011 M-4 D5200 B-2 D5404 F-3 IC5104 D-6 IC6201 D3001 M-7 D3013 M-4 D5200 D-2 D5405 F-3 IC5200 B-3 IC6202 D3001 M-7 D3013 M-4 D5201 E-2 D5807 F-7 IC5201 C-4 IC6203 IC6203	D2015 K-9 D3007 M-7 D3018 N-3 D3201 J-2 D5307 C-6 D5809 K-8 IC5302 B-4 D2018 M-2 D3008 M-7 D3019 N-3 D5103 D-6 D5400 E-4 IC5400 G-4 D2019 M-2 D3009 N-7 D3021 M-4 D5104 E-5 D5404 F-3 IC5104 D-6 IC6201 G-10 D2502 H-9 D3011 M-4 D3023 M-4 D5200 D-2 D5405 F-3 IC5200 B-3 IC6202 I-6 D3001 M-7 D3013 M-4 D3024 M-4 D5201 E-2 D5407 F-7 IC5201 C-4 IC6203 J-6 IC6203 J-6 IC6203 J-6 IC6203 J-6 IC6203 J-6 IC6203 D-5 IC6	D2015 K-9 D3007 M-7 D3018 N-3 D3020 J-2 D5307 C-6 D5809 K-8 IC5302 B-4 IC6207 D2018 M-2 D3009 N-7 D3019 N-3 D5103 D-6 D5400 E-4 IC5104 D-6 IC6201 G-10 Q5202 B-9 D3011 M-4 D5201 B-2 D5405 F-3 IC5200 B-3 IC6202 I-6 Q5301 D3001 M-7 D3013 M-4 D5201 B-2 D5807 F-7 IC5201 C-4 IC6203 J-6 Q5306 D5404 B-2 D5807 F-7 IC5201 C-4 IC6203 J-6 Q5306 D5404 D5501 B-2 D5807 F-7 IC5201 C-4 IC6203 J-6 Q5306 D5404 D5501 B-2 D5807 F-7 IC5201 C-4 IC6203 J-6 Q5306 D5404 D5501 B-2 D5807 F-7 IC5201 C-4 IC6203 J-6 Q5306 D5404 D5501 B-2 D5807 F-7 IC5201 C-4 IC6203 J-6 Q5306 D5404 D5501 B-2 D5807 F-7 IC5201 C-4 IC6203 J-6 Q5306 D5404 D5501 B-2 D5807 F-7 IC5201 C-4 IC6203 J-6 Q5306 D5404 D5501 B-2 D5807 F-7 IC5201 C-4 IC6203 J-6 Q5306 D5404 D5501 B-2 D5807 F-7 IC5201 C-4 IC6203 J-6 Q5306 D5404 D5501 B-2 D5807 F-7 IC5201 C-4 IC6203 J-6 Q5306 D5404 D5501 B-2 D5807 F-7 IC5201 C-4 IC6203 J-6 Q5306 D5404 D5501 B-2 D5807 F-7 IC5201 C-4 IC6203 J-6 Q5306 D5404 D5501 B-2 D5807 F-7 IC5201 C-4 IC6203 J-6 Q5306 D5404 D5501 B-2 D5807 F-7 IC5201 C-4 IC6203 J-6 Q5306 D5404 D5501 B-2 D5807 F-7 IC5201 C-4 IC6203 J-6 Q5306 D5404 D5501 B-2 D5807 F-7 IC5201 C-4 IC6203 J-6 Q5306 D5404 D5501 B-2 D5807 F-7 IC5201 C-4 IC6203 J-6 Q5306 D5404 D5501 B-2 D5807 F-7 IC5201 C-4 IC6203 J-6 Q5306 D5404 D5501 B-2 D5807 F-7 IC5201 C-4 IC6203 J-6 Q5306 D5404 D5501 B-2 D5807 F-7 IC5201 C-4 IC6203 J-6 Q5306 D5404 D

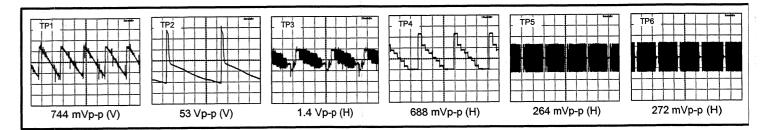
# ~ A Board Location Table (B Side) ~

DIC	ODE	D2503	G-9	D3024	B-3	D5309	J-3	IC5103	L-3	TRANS	SISTOR	Q3201	C-2	Q5300	M - 4	Q7003	H - 6
D0101	B - 7	D3001	B-7	D3026	B-2	D5400	K - 4	IC5104	K - 6	Q1000	C-6	Q3202	C-3	Q5301	L-5	Q7009	K - 6
D0104	C-5	D3003	B-7	D3028	C-2	D5401	J - 4	IC5200	M - 3	Q1001	D-6	Q3204	C-3	Q5302	K-7	Q7011	J-6
D0110	G-4	D3005	B - 7	D3201	F-2	D5404	J-3	IC5201	L-4	Q1004	D - 10	Q3300	F-3	Q5303	M - 4	Q7012	J-5
D0111	G - 2	D3007	B - 6	D5103	L-6	D5405	1-3	IC5300	J-3	Q1005	B-2	Q3301	F-3	Q5304	M - 5	Q7013	J-6
D0112	C-5	D3008	B - 6	D5104	J-5	D5809	K-8	IC5301	K - 4	Q1006	B-3	Q3302	F-3	Q5305	K-3	Q7014	J - 6
D0113	C-5	D3009	B - 6	D5200	K-2	D5811	L-8	IC5302	M - 4	Q2000	C-9	Q3500	F-3	Q5306	K-4	Q7015	1 - 5
D1006	B - 10	D3011	C - 4	D5202	L-4	D5812	L-8	IC5400	1-3	Q2002	D-9	Q3501	F-3	Q5400	J-4	Q7016	1-5
D2014	C - 9	D3013	C-4	D5300	L-5	D6200	F-7	IC6200	1-9	Q2003	D-9	Q5101	M - 5	Q5401	K-4	Q7017	1-6
D2015	D-9	D3015	C-4	D5303	N-4		IC	IC6201	1-8	Q2004	E-7	Q5200	M - 4	Q5402	J-5	Q7018	1-5
D2016	E-8	D3017	B - 4	D5304	M - 4	IC2000	C-8	IC6202	F-6	Q2005	E-7	Q5201	N - 3	Q5403	J-4	Q7019	1-5
D2018	B - 2	D3018	B - 3	D5305	L-6	IC2001	D-9	IC6203	E - 6	Q2501	G-8	Q5202	K-3	Q5404	J-4		
D2019	B-2	D3019	B - 3	D5306	L-5	IC2500	F-8	IC6205	K - 5	Q2502	G-9	Q5203	J-2	Q5813	J-8	Į.	
D2500	G-9	D3021	C - 4	D5307	L-7	IC3100	E - 5	IC6206	G-3	Q2503	G-9	Q5204	L-4	Q5815	L-8	Į.	
D2502	G-9	D3023	B - 3	D5308	M - 4	IC3200	E-3	IC6207	G - 4	Q3200	C-3	Q5205	M - 3	Q5816	L-8	l	

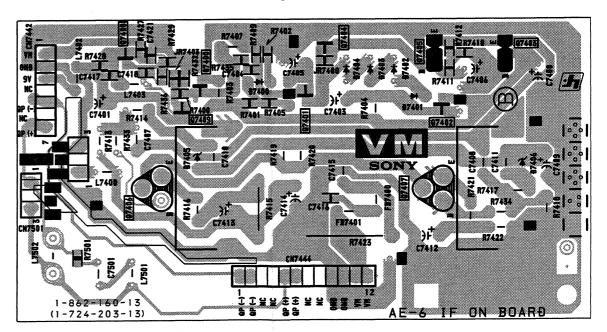
# ~ A Board Semiconductor Voltage Table ~

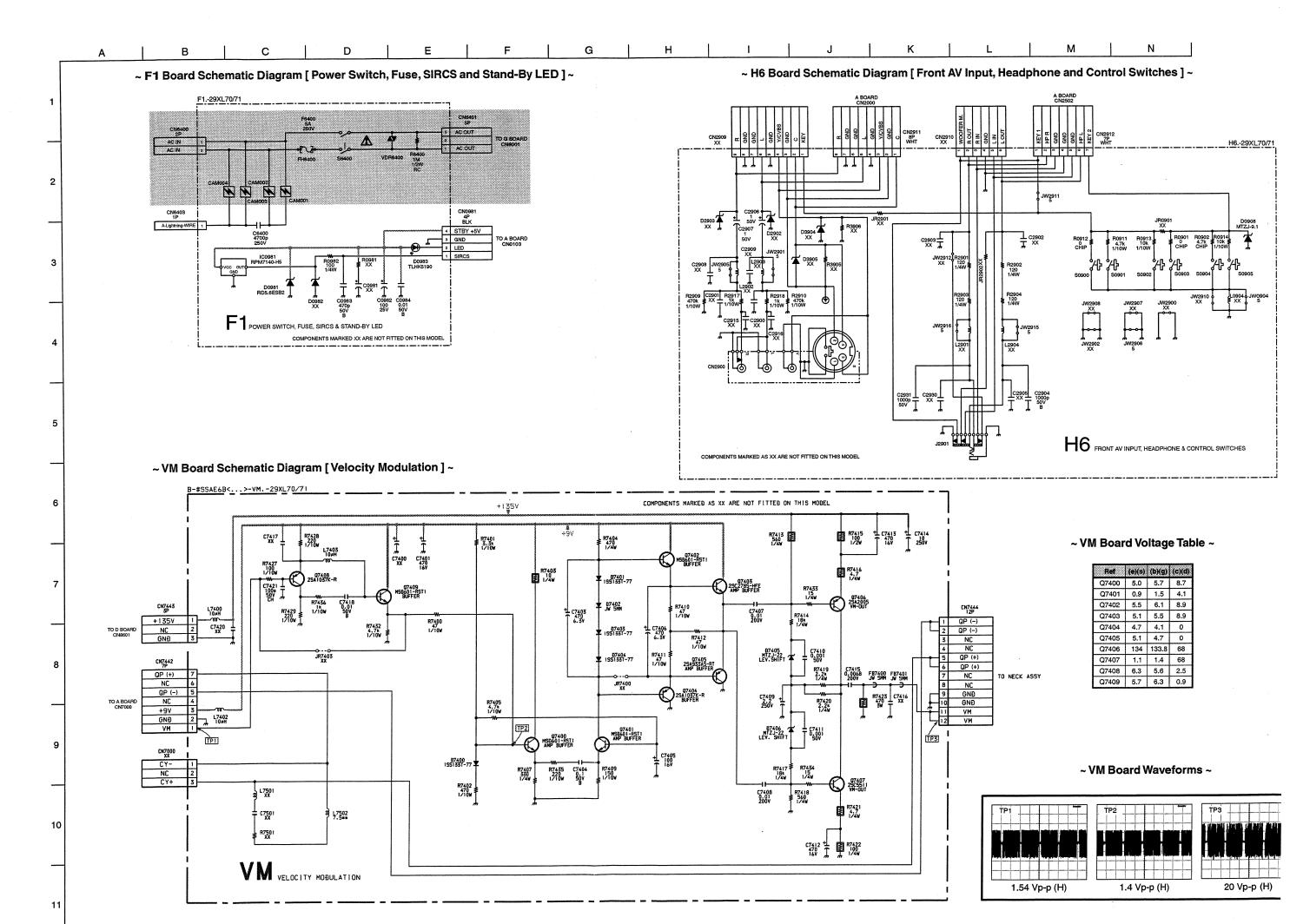
Ref	(s)	(g)	(d)	Ref	(e)	(b)	(c)	Ref	(e)	(b)	(c)	Ref	(e)	(b)	(c)	Ref	(e)	(b)	(c)	Ref	(e)	(b)	(c)
Q3500	2.7	3.3	3.9	Q2002	0	0	4	Q3204	5	4.4	3.4	Q5205	1.9	1.2	0	Q5813	0	7.9	0	Q7015	11.6	10.9	8.8
Q3501	2.7	3.3	4	Q2003	0	0	4	Q3300	0.7	1.3	5	Q5300	0	0.4	2.2	Q5814	0	0	0	Q7016	6	6.6	10.9
Q5301	0	5.1	51.2	Q2004	3.3	3.9	8.3	Q3301	1.9	1.2	0	Q5301	5.1	0	51.2	Q5815	0	0	5	Q7017	2.7	2	0
Q5404	0	0	0.5	Q2005	3.3	3.9	8.3	Q3302	1.9	1.2	0	Q5302	8.9	5.7	0	Q5816	5	5	0	Q7018	11.6	10.9	8.6
Ref	(e)	(b)	(c)	Q2501	0	0	15.2	Q3500	3.3	2.7	3.9	Q5304	0	0.4	5.6	Q7003	5.6	6.2	8.8	Q7019	6	6.6	10.9
Q1001	3.2	3.9	8.3	Q2502	0	0.7	0	Q3501	3.3	2.7	4	Q3400	0	0	0.1	Q7009	3.2	7	0.1	Q7020	8.9	8.9	0
Q1004	1.9	1.3	0	Q2503	0.6	0.6	0.5	Q5101	0	0.4	6.4	Q5401	0	0	7.9	Q7011	2.5	1.9	0	Q7021	2.7	2.7	8.9
Q1005	0	0.5	5	Q3200	1.9	2.5	4.4	Q5201	2.8	3.4	7.9	Q5402	0	0	-11.3	Q7012	11.6	10.9	8.7				
Q1006	5	4.7	1	Q3201	1.9	2.5	4.4	Q5202	0.2	0.8	11.7	Q5403	-13.5	-11.2	-8.3	Q7013	6	6.6	10.9				
Q2000	4.2	4.8	8.3	Q3202	5	4.4	3.4	Q5203	0.2	0.8	11.7	Q5404	0	0	0.5	Q7014	2.5	1.8	0				

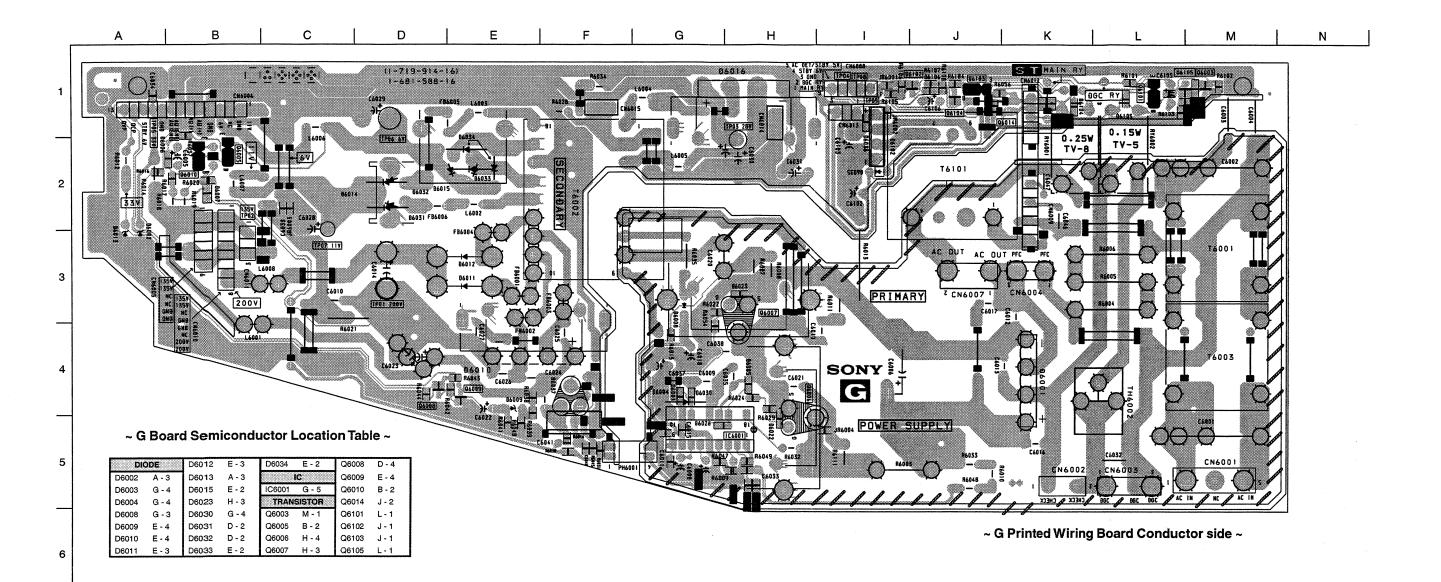
### ~ A Board Waveforms ~

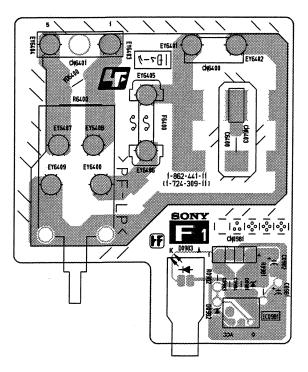


# ~ VM Printed Wiring Board Conductor side ~



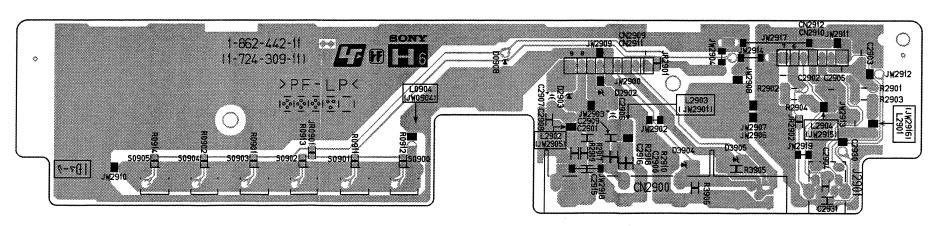




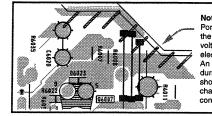


~ F1 Printed Wiring Board Conductor side ~

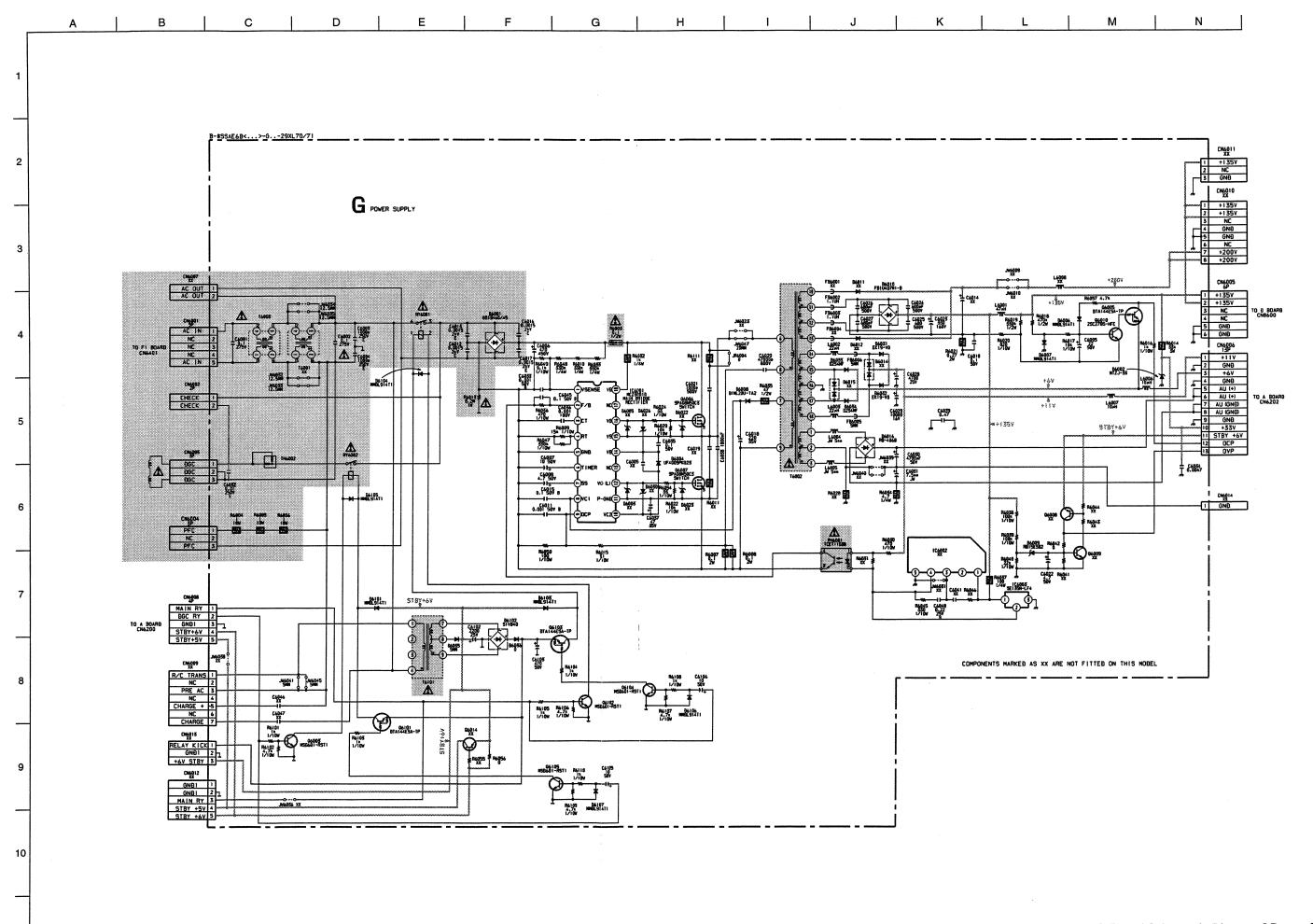
11

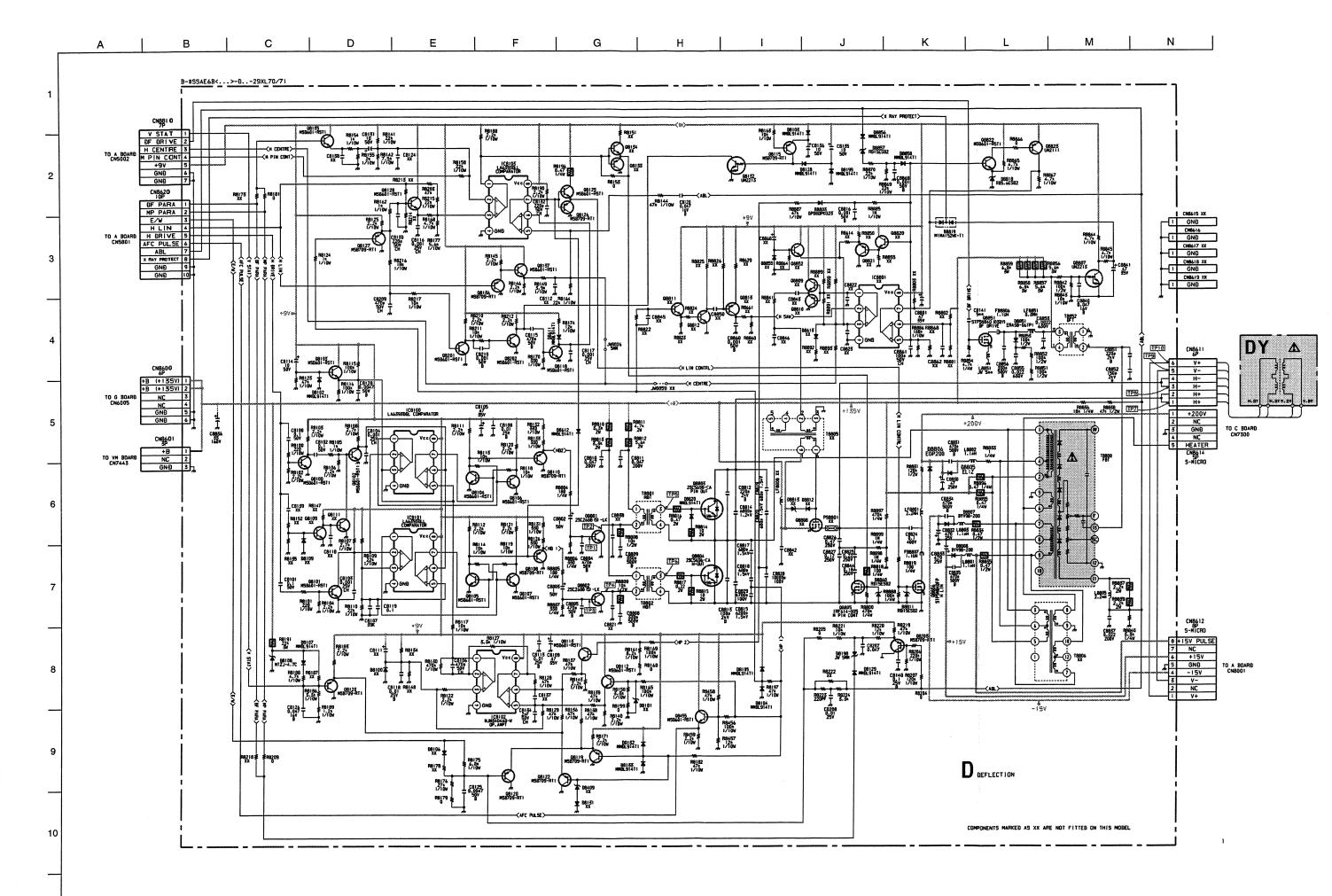


~ H6 Printed Wiring Board Conductor side ~

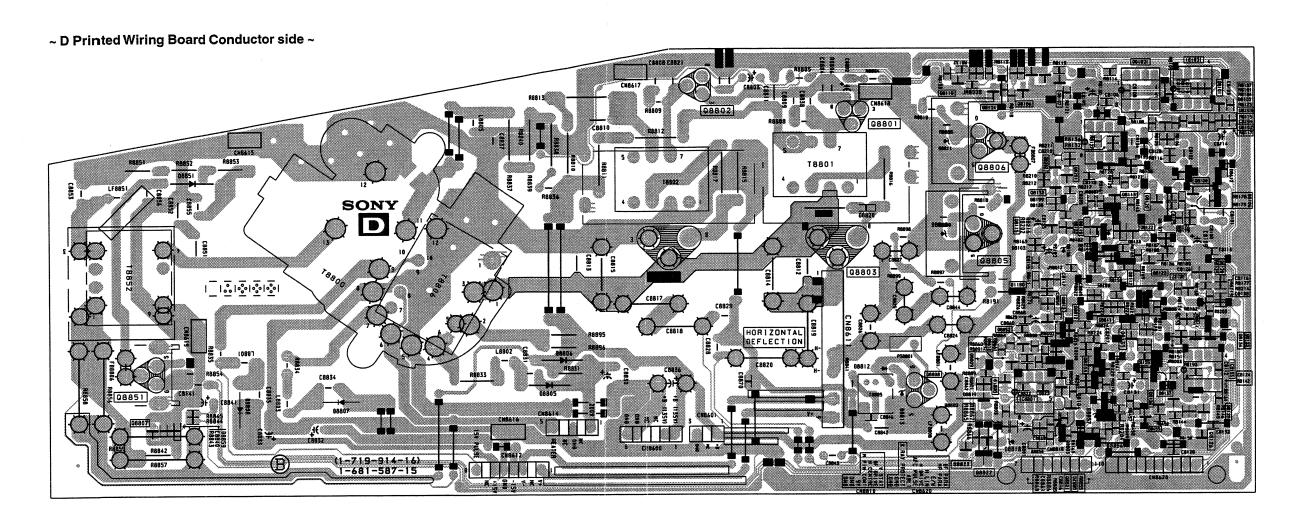


Portions of the circuit contained within the marked areas as shown have high voltages present. Use care to prevent electric shock during inspection or repair. An Isolation Transformer must be used during any Service work to avoid possible shock hazard due to live chassis. The chassis of this receiver is directly connected to the power line.

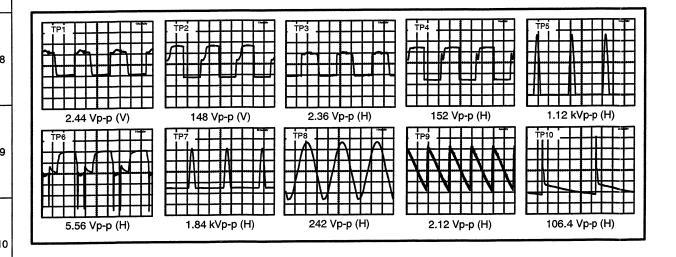




A I B | C | D | E | F | G | H | I | J | K | L | M | N



#### ~ D Board Waveforms ~

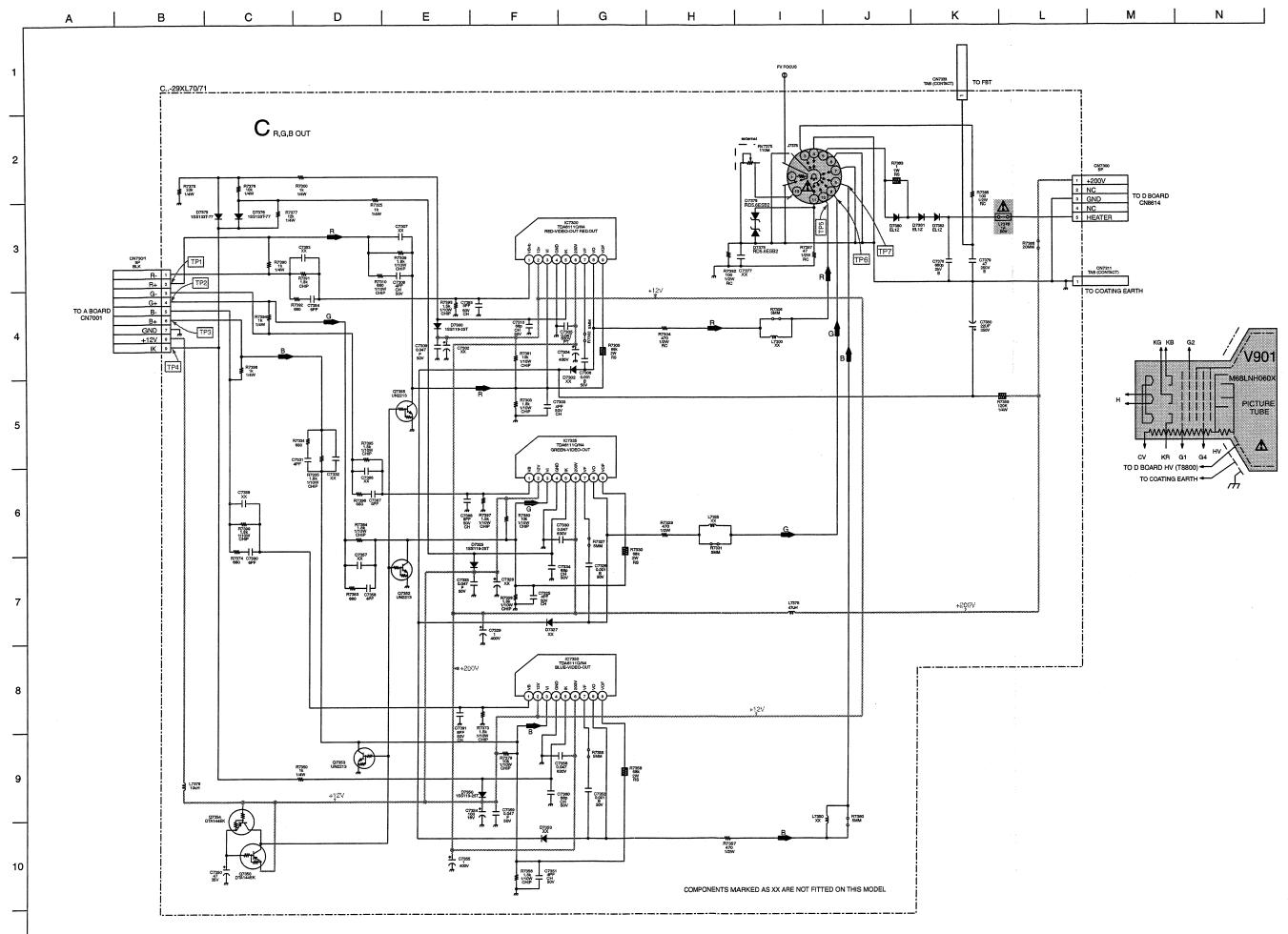


### ~ D Board IC Voltage Table ~

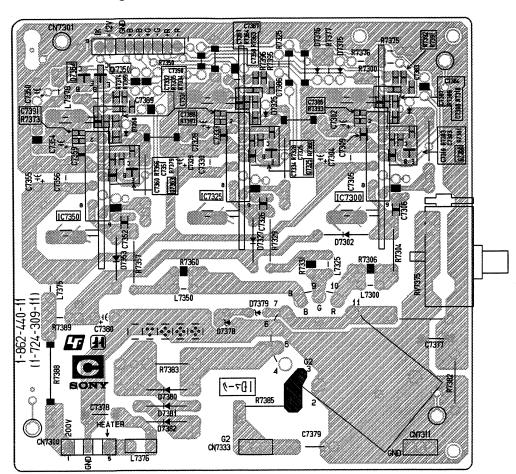
IC	Voltage	Table
Ref No	Pin No	Voltage (V)
	1	0.3
	2	4.3
IC8100	3	4.1
100100	5	4.1
	6	3.0
	7	0.4
	1	0.3
	2	4.3
IC8101	3	4.4
ICO IU I	5	4.4
	6	3.0
	7	0.4
	1	4.1
	2	0.4
IC8102	3	0.4
100102	5	0.4
	6	0.4
	7	0.4
	1	2.5
	2	2.1
IC8103	3	1.7
.00.00	5	1.6
	6	1.0
	7	1.1

#### ~ D Board Semiconductor Voltage Table ~

Ref	(e)(s)	(b)(g)	(c)(d)	Ref	(e)(s)	(b)(g)	(c)(d)	Ref	(e)(s)	(b)(g)	(c)(d)	Ref	(e)(s)	(b)(ç
Q8100	0	0.6	3.6	Q8110	2.4	3.1	0	Q8128	3.4	1.5	8.9	Q8801	0	0.4
Q8101	0	0.6	4.3	Q8113	0.3	0.2	8.9	Q8132	0	0	3.4	Q8802	0	0.4
Q8102	0	0.3	4.3	Q8115	8.6	8.9	0	Q8135	2.6	3.2	8.9	Q8807	0	6.3
Q8103	4.0	0	8.9	Q8118	0	0	5.0	Q8136	2.5	1.8	0	Q8818	0	0
Q8104	0	0.4	3.1	Q8119	0.7	1.4	0	Q8137	1.8	2.5	8.9	Q8822	5.5	4.9
Q8105	0	0.4	3.2	Q8120	0.7	2.3	0	Q8201	0	0.6	3.9	Q8823	8.9	8.5
Q8106	0	0.3	4.3	Q8122	0.5	1.4	0	Q8202	0	0.8	3.4	Q8805	0	2.5
Q8107	0	0.3	4.2	Q8123	0.5	1.4	0	Q8203	1.4	0.9	0	Q8806	0	1.2
Q8108	2.4	3.2	0	Q8127	1.4	1.5	0	Q8455	1.1	1.7	8.9	Q8851	0	5.4



### ~ C Printed Wiring Board Conductor side ~



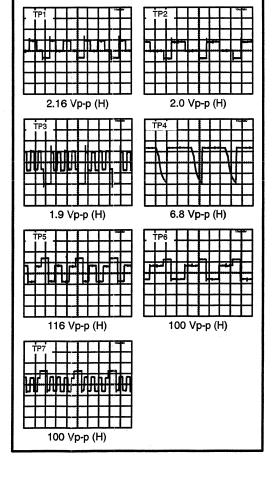
# ~ C Board Semiconductor Voltage Table ~

Ref	(e)	(b)	(c)
Q7350	12	11.98	0
Q7352	0	0	3.8
Q7353	0	0	3.8
Q7354	11.98	12	0
07355	0	0	3.8

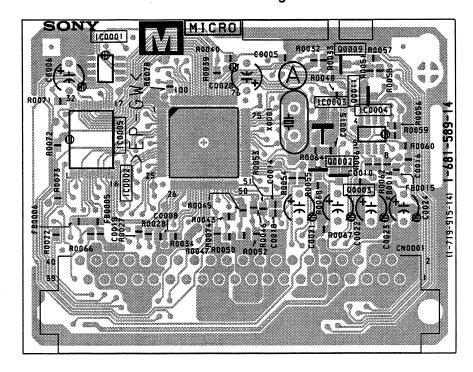
# ~ C Board IC Voltage Table ~

IC Voltage Table									
Ref No	Pin No	Voltage (V)							
	1	3.9							
	3	3.8							
	5	7.5							
IC7300	6	200							
	7	140							
	8	153							
	9	140							
	1	3.9							
	3	3.8							
	5	7.7							
IC7325	6	200							
	7	140							
	8	153							
	9	140							
	1	3.9							
	3	3.8							
	5	7.5							
IC7350	6	200							
	7	139							
	8	148							
	9	138							

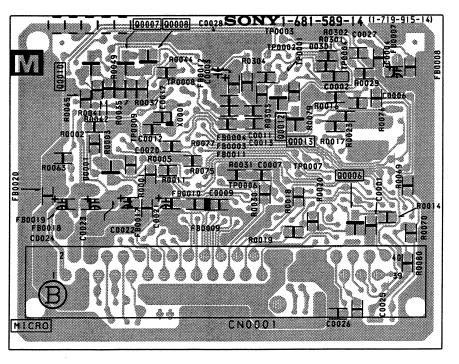
### ~ C Board Waveforms ~

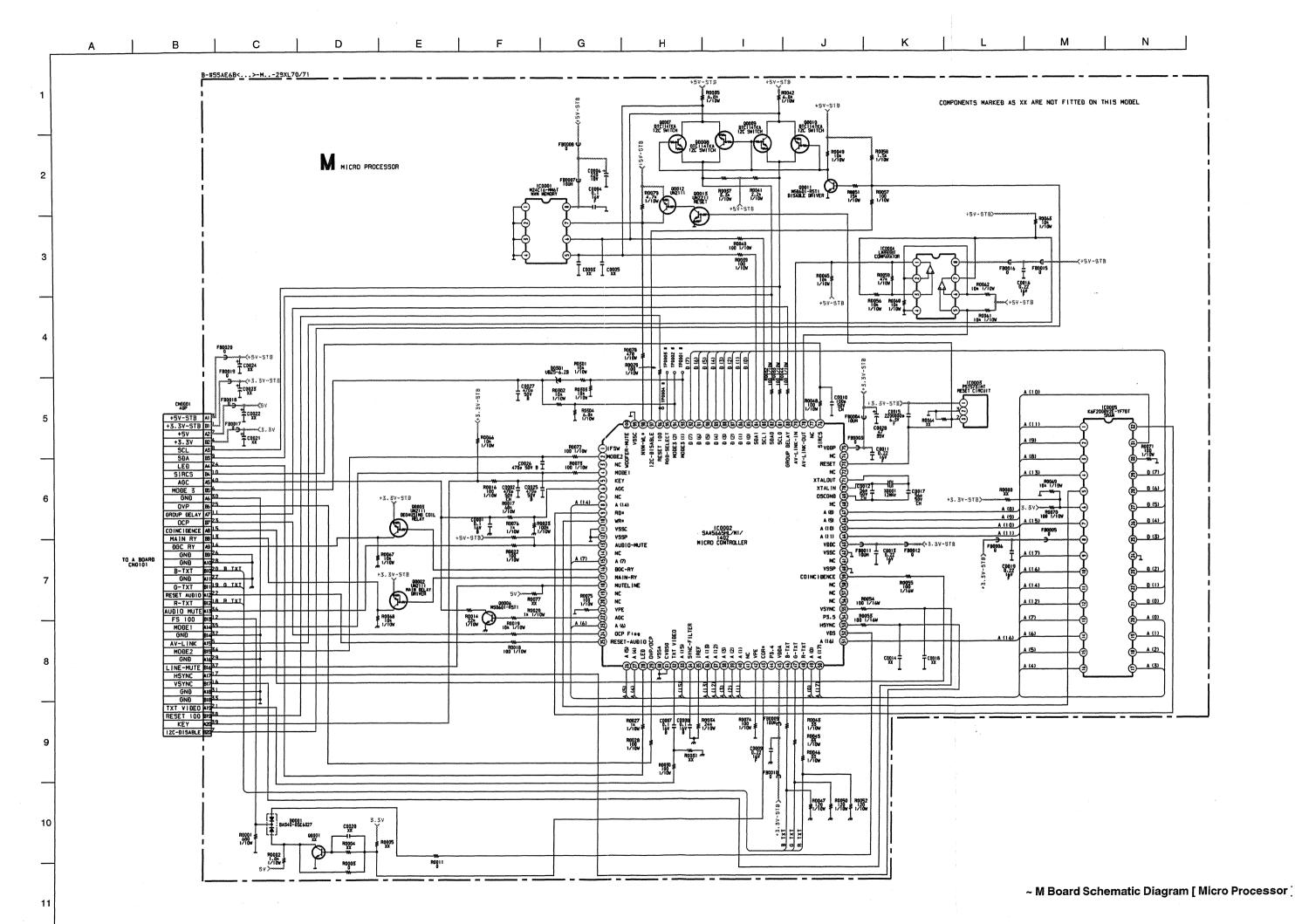


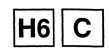
### ~ M Printed Wiring Board Conductor side A ~



# ~ M Printed Wiring Board Conductor side B ~







REF.NO.	PART.NO	DESCRIPTION	REMARK	REF.NO.	PART.NO	DESCRIPTION		REMARK
* A-10	55-452-A H6 Bo	ard Complete		C7304	1-107-967-11	ELECT	1UF	20.00% 400V
				C7305	1-136-207-11	MYLAR	0.047UF	5.00% 630V
	< CAPAC	TITOR >		C7306	1-163-009-91	CERAMIC CHIP	0.001UF	10.00% 50V
				C7308	1-162-909-11	CERAMIC CHIP	4PF	0.25PF 50V
C2904	1-162-964-11	CERAMIC CHIP 0.001UF	10.00% 50V	C7309	1-163-035-00	CERAMIC CHIP	0.047UF	50V
C2906	1-126-960-11	ELECT 1UF	20.00% 50V					
C2907	1-126-960-11	ELECT 1UF	20.00% 50V	C7310	1-163-247-91	CERAMIC CHIP	68PF	5.00% 50V
C2931	1-162-964-11	CERAMIC CHIP 0.001UF	10.00% 50V	C7325	1-162-909-11	CERAMIC CHIP	4PF	0.25PF 50V
<b></b>				C7326	1-163-009-91	CERAMIC CHIP	0.001UF	10.00% 50V
	< CONNE	CTOR >		C7329	1-107-967-11	ELECT	1UF	20.00% 400V
				C7330	1-136-207-11	MYLAR	0.047UF	5.00% 630V
CN2900	1-779-947-11	TERMINAL BLOCK, S		1				
CN2911	* 1-564-511-11	PLUG, CONNECTOR 8P		C7331	1-162-909-11	CERAMIC CHIP	4PF	0.25PF 50V
CN2912	* 1-564-510-11	PLUG, CONNECTOR 7P		C7333	1-163-035-00	CERAMIC CHIP	0.047UF	50V
				C7334	1-163-247-91	CERAMIC CHIP	68PF	5.00% 50V
	< DIODE	· >		C7350	1-126-947-11	ELECT	47UF	20.00% 35V
				C7351	1-162-909-11	CERAMIC CHIP	4PF	0.25PF 50V
D0908	8-719-923-60	DIODE MTZJ-T-77-9.1A						
				C7352	1-163-009-91	CERAMIC CHIP		10.00% 50V
	< SOCKE	T >		C7354	1-126-933-11	ELECT	100UF	20.00% 16V
				C7355	1-107-967-11	ELECT	1UF	20.00% 400V
J2901	1-750-264-11	JACK		C7356	1-136-207-11	MYLAR	0.047UF	5.00% 630V
	. 2007	amon \		C7358	1-162-909-11	CERAMIC CHIP	421	0.25PF 50V
	< RESIS	STUR >		C7359	1-163-035-00	CERAMIC CHIP	0.047IIF	50V
R0901	1-216-864-11	SHORT CHIP 0		C7360	1-163-247-91	CERAMIC CHIP		5.00% 50V
R0901 R0902	1-216-829-11	METAL CHIP 4.7K	5% 1/10W	C7378	1-162-116-00	CERAMIC	680PF	10.00% 2KV
R0902 R0911	1-216-829-11	METAL CHIP 4.7K	,	C7379	1-162-114-00	CERAMIC	0.0047UF	2KV
R0911	1-216-864-11	SHORT CHIP 0	J	C7380	1-107-655-11	ELECT	47UF	20.00% 250V
R0913	1-216-833-11		5% 1/10W					
110320			•	C7384	1-162-911-11	CERAMIC CHIP	6PF	0.50PF 50V
R0914	1-216-833-11	METAL CHIP 10K	5% 1/10W	C7385	1-162-913-11	CERAMIC CHIP	8PF	0.50PF 50V
R2901	1-249-406-11	CARBON 120	5% 1/4W	C7387	1-162-911-11	CERAMIC CHIP	6PF	0.50PF 50V
R2902	1-249-406-11	CARBON 120	5% 1/4W	C7388	1-162-913-11	CERAMIC CHIP	8PF	0.50PF 50V
R2903	1-249-406-11	CARBON 120	5% 1/4W	C7390	1-162-911-11	CERAMIC CHIP	, 6PE	0.50PF 50V
R2904	1-249-406-11	CARBON 120	5% 1/4W					
				C7391	1-162-913-11	CERAMIC CHIP	8PF	0.50PF 50V
R2909	1-216-853-11	METAL CHIP 470K						
R2910	1-216-853-11	METAL CHIP 470K			< COA:	FING LEAD >		
R2917	1-216-821-11		5% 1/10W	07.7201	+ 4 100 000 01	NTW/20\ WTD	177	
R2918	1-216-821-11	METAL CHIP 1K	5% 1/10W	CL7301 CL7303	* 4-102-022-01 * 4-102-022-01	PIN(30), WIR PIN(30), WIR		
	< SWITC	י נור		CE/303	4-102-022-01	PIN(SU), NIN	Ti.	
	\ DHII\	, , , , , , , , , , , , , , , , , , ,			< CONT	NECTOR >		
s0900	1-692-431-21	SWITCH, TACTILE						
S0901	1-692-431-21	SWITCH, TACTILE		CN7300	* 1-564-508-11	PLUG, CONNEC	TOR 5P	
S0902	1-692-431-21	SWITCH, TACTILE		CN7301	* 1-564-512-11	PLUG, CONNEC	TOR 9P	
s0903	1-692-431-21	SWITCH, TACTILE		CN7311	1-695-915-11	TAB (CONTACT	<b>'</b> )	
S0904	1-692-431-21	SWITCH, TACTILE		CN7333	1-695-915-11	TAB (CONTACT	·)	
\$0905	1-692-431-21	SWITCH, TACTILE			< DIO	DE >		
	NET 000 4 -0-5	and Commission	···		0 840 044 4A	BTARM 4-444A	. 05	
* A-10	)55-968-A C Boa	ard Complete		D7300	8-719-911-19 8-719-911-19	DIODE 1SS119 DIODE 1SS119		
	4-382-854-01	SCREW (M3X8), P, SW	(+)	D7325 D7350	8-719-911-19 8-719-911-19	DIODE 188119 DIODE 188119		
	4-302-034-01	DOMEN (MORO), F, SW	V'/	D7350	8-719-911-19	DIODE 188133		
	< CAPAC	TTTOR >		D7375	8-719-991-33	DIODE 188133		
	CAFAC			21310	Q 123 332 33	2200 100133		
C7303	1-162-909-11	CERAMIC CHIP 4PF	0.25PF 50V	D7378	8-719-109-89	DIODE RD5.6E	SB2	

Note: The components identified by shading and marked △ are critical for safety. Replace only with the part numbers specified in the parts list.

C	F1

REF.NO.	PART.NO	DESCRIPTION			REMARK	REF.NO.	PART.NO	DESCRIPTION			REMARK
D7379	8-719-109-89	DIODE RD5.6ES	B?			R7373	1-216-823-11	METAL CHIP	1.5K		1/10W
D7380	8-719-302-43	DIODE EL1Z	DZ			R7374	1-216-819-11	METAL CHIP	680	5%	1/10W
	8-719-302-43	DIODE EL1Z				R7375	1-249-435-11	CARBON	33K	5%	1/4W
D7381						1	1-249-435-11	CARBON	10K	5% 5%	1/4W
D7382	8-719-302-43	DIODE EL1Z				R7376					
	< IC :	<b>&gt;</b>				R7377	1-249-430-11	CARBON	12K	5%	1/4W
						R7379	1-216-833-11	METAL CHIP	10K	5%	1/10W
IC7300	8-759-360-83	IC TDA6111Q/N	4			R7380	1-216-833-11	METAL CHIP	10K	5%	1/10W
IC7325	8-759-360-83	IC TDA6111Q/N	4			R7381	1-216-833-11	METAL CHIP	10K	5%	1/10W
IC7350	8-759-360-83	IC TDA6111Q/N	4			R7382	1-202-549-00	SOLID	100	20%	1/2W
						R7383	1-216-349-00	METAL OXIDE	1	5%	1W
	< SOC	KET >				2205	1 000 540 00	407 TD	100	000	1 /00
						R7385	1-202-549-00	SOLID	100	20%	1/2W
J7375 Z	A 1-251-732-11	SOCKET, CRT				R7387	1-247-735-11	CARBON	47	5% 	1/2W
						R7388	1-535-143-51	LEAD, JUMPE	•		
	< COI:	r >				R7389	1-247-881-00	CARBON	120K		1/4W
						R7390	1-249-417-11	CARBON	1K	5%	1/4W
L7375	1-410-671-31	INDUCTOR	4701	**********		-5001	1 01 0 00 1 11		1 0***	۳ń	1 /1 000
	∆ 1-532-637-00	IC LINK	12	51	JV	R7391	1-216-824-11	METAL CHIP	1.8K		1/10W
L7378	1-414-934-21	INDUCTOR	10U	I		R7392	1-216-819-11	METAL CHIP	680	5%	1/10W
						R7393	1-216-823-11	METAL CHIP	1.5K		1/10W
	< TRA	NSISTOR >				R7394	1-249-417-11	CARBON	1K	5%	1/4W
						R7395	1-216-824-11	METAL CHIP	1.8K	5%	1/10W
Q7350	8-729-901-06	TRANSISTOR DT	A144E	ζ.							
Q7352	8-729-421-19	TRANSISTOR UN	2213			R7396	1-216-819-11	METAL CHIP	680	5%	1/10W
Q7353	8-729-421-19	TRANSISTOR UN	2213			R7397	1-216-823-11	METAL CHIP	1.5K	5%	1/10W
Q7354	8-729-901-06	TRANSISTOR DT	A144EF	ζ.		R7398	1-249-417-11	CARBON	1K	5%	1/4W
Q7355	8-729-421-19	TRANSISTOR UN	2213			R7399	1-216-824-11	METAL CHIP	1.8K	5%	1/10W
	< RES	ISTOR >					< RESI	STOR VARIABLE >			
R7300	1-249-417-11	CARBON	1K	5%	1/4W	RV7375	1-241-656-11	RES, ADJ, M	CTAL FII	м 110	)M
R7302	1-535-303-00	LEAD, JUMPER			_,			,,			
R7303	1-216-824-11	METAL CHIP	1.8K		1/10W	* A-10	55-970-A F1 B	oard Complet	е		
R7304	1-260-095-11	CARBON	470	5%	1/2W						
R7305	1-215-903-11	METAL OXIDE	68K	5%	2W		4-206-220-01	HOLDER, LED			
K1303	1 223 313 22		****	••			* 4-374-846-01	COVER, CAPA	CITOR, C	AP TY	(PE
R7306	1-535-303-00	LEAD, JUMPER	(5.0MA	1)							
R7309	1-216-824-11	METAL CHIP	1.8K	5%	1/10W		< CAPA	CITOR >			
R7310	1-216-819-11	METAL CHIP	680	5%	1/10W						
R7325	1-249-417-11	CARBON	1K	5%	1/4W	C0982	1-104-665-11	ELECT	100UF		20.00% 25V
R7327	1-535-303-00	LEAD, JUMPER	(5.0MA	1)	•	C0983	1-102-114-00	CERAMIC	470PF		10.00% 50V
******			,			C0984	1-102-129-00	CERAMIC	0.01UE	•	10.00% 50V
R7328	1-216-824-11	METAL CHIP	1.8K	5%	1/10W	C6400	1-113-924-11	CERAMIC	0.0047	UF	20.00% 250V
R7329	1-260-095-11	CARBON	470	5%	1/2W		<del>-</del>				
	1-215-903-11	METAL OXIDE	68K	5%	1/2 <b>n</b> 2W		< CONN	ECTOR >			
R7330		LEAD, JUMPER			411		Conta				
R7331	1-535-303-00	•			1 /1 01	CN0981	* 1-564-507-11	PLUG, CONNEC	TOR AD		1
R7334	1-216-819-11	METAL CHIP	680	5%	1/10W		A * 1-580-843-11	PIN, CONNECT		ER)	
R7335	1-216-824-11	METAL CHIP	1.8K	5%	1/10W	CN6401 Z	A * 1-691-291-11	PIN, CONNECT			) 5P
R7350	1-249-417-11	CARBON	1K	5%	1/4W	CN6403	1-695-915-11	TAB (CONTACT	<b>!</b> )		
R7355	1-535-303-00	LEAD, JUMPER			•						
R7356	1-216-824-11	METAL CHIP	1.8K		1/10W		< DIOD	E >			
R7357	1-260-095-11	CARBON	470	5%	1/2W						
AI JOI	1 700 A33-TI	WILWOIT .	-10	•	-,	D0981	8-719-109-89	DIODE RD5.6E	SB2		
D7250	1-215-903-11	METAL OXIDE	68K	5%	2W	D0983	8-719-082-12	DIODE TLHK51			
R7358					<b>4</b> 11		av vvm am		·-· •		
R7360	1-535-303-00	LEAD, JUMPER			1 /1 01-7						
R7363	1-216-819-11	METAL CHIP	680	5%	1/10W						

METAL CHIP 1.8K 5% 1/10W

R7364

1-216-824-11

Note: The components identified by shading and marked ∆ are critical for safety. Replace only with the part numbers specified in the parts list.

F1	Α

REF.NO.	PART.NO	DESCRIPTION	REMARK	REF.NO.	PART.NO	DESCRIPTION	REMARK
	< FUSE	>		C1034	1-126-933-11	ELECT 100UF	20.00% 16V
				C1035	1-126-964-11	ELECT 10UF	20.00% 50V
<b>F6400</b> A	1-576-232-12	FUSE 52	250V	C1037	1-164-315-11	CERAMIC CHIP 470PF	5.00% 50V
FH6400 A	1-533-725-11	FUSE HOLDER		C1039	1-107-826-11	CERAMIC CHIP 0.1UF	10.00% 16V
***************************************				C1040	1-162-970-11	CERAMIC CHIP 0.01UF	10.00% 25V
	< IC >						
				C2000	1-162-968-11	CERAMIC CHIP 0.0047	UF 10.00% 50V
IC0981	6-600-129-01	IC RPM7140-H5		C2001	1-162-968-11	CERAMIC CHIP 0.0047	UF 10.00% 50V
				C2006	1-162-962-11	CERAMIC CHIP 470PF	10.00% 50V
	< RESI	STOR >		C2007	1-163-021-91	CERAMIC CHIP 0.01UF	10.00% 50V
				C2008	1-162-964-11	CERAMIC CHIP 0.001U	F 10.00% 50V
R0982	1-247-807-31	CARBON 100 59	ł 1/4W				
<b>R64</b> 00 Z	A 1-202-719-00	SOLID 1M 10	)% 1/2W	C2009	1-163-021-91	CERAMIC CHIP 0.01UF	
				C2010	1-162-964-11	CERAMIC CHIP 0.001U	
	< SWIT	CH >		C2011	1-162-962-11	CERAMIC CHIP 470PF	10.00% 50V
				C2012	1-162-962-11	CERAMIC CHIP 470PF	10.00% 50V
\$6400 Z	A 1-571-433-21	SWITCH, PUSH (AC POWER	1)	C2013	1-162-962-11	CERAMIC CHIP 470PF	10.00% 50V
	< VARI	የሞባጽ >		C2014	1-164-346-11	CERAMIC CHIP 1UF	16V
	\ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \	DION /		C2015	1-163-021-91	CERAMIC CHIP 0.01UF	
VDR6400 Z	1-803-830-11	VARISTOR (ERZV14D621)		C2016	1-162-962-11	CERAMIC CHIP 470PF	10.00% 50V
ADVOAGO 7	7 T 002 030 11	160120101 (20121210022)		C2018	1-162-962-11	CERAMIC CHIP 470PF	10.00% 50V
* A-163	32-952-A A Bo	ard Complete		C2019	1-164-346-11	CERAMIC CHIP 1UF	16V
A. 1.0				-		<b>Carallet Char</b>	
	4-382-854-01	SCREW (M3X8), P, SW (	+)	C2021	1-162-962-11	CERAMIC CHIP 470PF	10.00% 50V
				C2022	1-162-966-11	CERAMIC CHIP 0.0022	UF 10.00% 50V
	< CAPA	CITOR >		C2023	1-162-966-11	CERAMIC CHIP 0.0022	UF 10.00% 50V
				C2024	1-164-346-11	CERAMIC CHIP 1UF	16V
C1002	1-162-925-11	CERAMIC CHIP 68PF	5.00% 50V	C2026	1-162-962-11	CERAMIC CHIP 470PF	10.00% 50V
C1003	1-162-925-11	CERAMIC CHIP 68PF	5.00% 50V				
C1004	1-126-933-11	ELECT 100UF	20.00% 16V	C2027	1-126-947-11	ELECT 47UF	20.00% 35V
C1005	1-163-021-91	CERAMIC CHIP 0.01UF	10.00% 50V	C2028	1-126-947-11	ELECT 47UF	20.00% 35V
C1006	1-126-933-11	ELECT 100UF	20.00% 16V	C2029	1-164-346-11	CERAMIC CHIP 1UF	16V
				C2031	1-162-962-11	CERAMIC CHIP 470PF	10.00% 50V
C1008	1-163-021-91	CERAMIC CHIP 0.01UF	10.00% 50V	C2034	1-164-346-11	CERAMIC CHIP 1UF	16V
C1010	1-162-970-11	CERAMIC CHIP 0.01UF	10.00% 25V	1			
C1011	1-126-947-11	ELECT 47UF	20.00% 35V	C2035	1-164-346-11	CERAMIC CHIP 1UF	16V
C1012	1-162-970-11	CERAMIC CHIP 0.01UF	10.00% 25V	C2038	1-162-970-11	CERAMIC CHIP 0.01UF	10.00% 25V
C1013	1-163-131-00	CERAMIC CHIP 390PF	5.00% 50V	C2039	1-162-906-11	CERAMIC CHIP 1.5PF	0.25PF 50V
				C2040	1-162-964-11	CERAMIC CHIP 0.001U	F 10.00% 50V
C1014	1-162-970-11	CERAMIC CHIP 0.01UF	10.00% 25V	C2041	1-162-906-11	CERAMIC CHIP 1.5PF	0.25PF 50V
C1015	1-162-970-11	CERAMIC CHIP 0.01UF	10.00% 25V				
C1016	1-125-891-11	CERAMIC CHIP 0.47UF	10.00% 10V	C2042	1-163-249-11	CERAMIC CHIP 82PF	5.00% 50V
C1017	1-127-715-91	CERAMIC CHIP 0.22UF	10.00% 16V	C2043	1-162-962-11	CERAMIC CHIP 470PF	10.00% 50V
C1018	1-115-340-11	CERAMIC CHIP 0.22UF	10.00% 25V	C2044	1-163-021-91	CERAMIC CHIP 0.01UF	10.00% 50V
				C2046	1-162-923-11	CERAMIC CHIP 47PF	5.00% 50V
C1019	1-162-927-11	CERAMIC CHIP 100PF	5.00% 50V	C2047	1-162-927-11	CERAMIC CHIP 100PF	5.00% 50V
C1020	1-164-004-11	CERAMIC CHIP 0.1UF	10.00% 25V				
C1021	1-107-826-11	CERAMIC CHIP 0.1UF	10.00% 16V	C2048	1-126-947-11	ELECT 47UF	20.00% 35V
C1024	1-162-919-11	CERAMIC CHIP 22PF	5.00% 50V	C2049	1-162-925-11	CERAMIC CHIP 68PF	5.00% 50V
C1025	1-216-864-11	SHORT CHIP 0		C2050	1-107-823-11	CERAMIC CHIP 0.47UF	10.00% 16V
				C2051	1-126-964-11	ELECT 10UF	20.00% 50V
C1026	1-162-970-11	CERAMIC CHIP 0.01UF	10.00% 25V	C2052	1-164-004-11	CERAMIC CHIP 0.1UF	10.00% 25V
C1027	1-162-926-11	CERAMIC CHIP 82PF	5.00% 50V				
C1028	1-164-388-91	CERAMIC CHIP 270PF	5.00% 50V	C2053	1-164-227-11	CERAMIC CHIP 0.022U	
C1029	1-162-915-11	CERAMIC CHIP 10PF	0.50PF 50V	C2054	1-126-947-11	ELECT 47UF	20.00% 35V
C1030	1-162-928-11	CERAMIC CHIP 120PF	5.00% 50V	C2055	1-162-968-11	CERAMIC CHIP 0.0047	JF 10.00% 50V
				C2057	1-126-964-11	ELECT 10UF	20.00% 50V
C1031	1-162-970-11	CERAMIC CHIP 0.01UF	10.00% 25V	C2058	1-164-004-11	CERAMIC CHIP 0.1UF	10.00% 25V



REF.NO.	PART.NO	DESCRIPTION		REMARK	REF.NO.	PART.NO	DESCRIPTION	REMARK
C2059	1-126-964-11	ELECT	10UF	20.00% 50V	C2523	1-115-339-11	CERAMIC CHIP 0.1UF	10.00% 50V
C2060	1-126-947-11	ELECT	47UF	20.00% 35V	C3101	1-163-021-91	CERAMIC CHIP 0.01UF	10.00% 50V
C2061	1-162-968-11	CERAMIC CHIP		10.00% 50V	C3102	1-163-021-91	CERAMIC CHIP 0.01UF	10.00% 50V
C2062	1-164-346-11	CERAMIC CHIP		16V	C3103	1-163-021-91	CERAMIC CHIP 0.01UF	10.00% 50V
C2063	1-164-346-11	CERAMIC CHIP		16V	C3104	1-163-021-91	CERAMIC CHIP 0.01UF	10.00% 50V
02003	1 201 011 ==	<b>4</b>						
C2064	1-126-964-11	ELECT	10UF	20.00% 50V	C3105	1-163-021-91	CERAMIC CHIP 0.01UF	10.00% 50V
C2065	1-162-966-11	CERAMIC CHIP	0.0022UF	10.00% 50V	C3106	1-163-021-91	CERAMIC CHIP 0.01UF	10.00% 50V
C2066	1-162-966-11	CERAMIC CHIP	0.0022UF	10.00% 50V	C3107	1-163-021-91	CERAMIC CHIP 0.01UF	10.00% 50V
C2069	1-127-715-91	CERAMIC CHIP	0.22UF	10% 16V	C3108	1-163-021-91	CERAMIC CHIP 0.01UF	10.00% 50V
C2073	1-126-960-11	ELECT	1UF	20.00% 50V	C3109	1-163-021-91	CERAMIC CHIP 0.01UF	10.00% 50V
C2074	1-126-960-11	ELECT	1UF	20.00% 50V	C3112	1-126-964-11	ELECT 10UF	20.00% 50V
C2075	1-126-960-11	ELECT	1UF	20.00% 50V	C3113	1-126-963-11	ELECT 4.7UF	20.00% 50V
C2077	1-126-960-11	ELECT	1UF	20.00% 50V	C3114	1-126-963-11	ELECT 4.7UF	20.00% 50V
C2078	1-126-963-11	ELECT	4.7UF	20.00% 50V	C3115	1-126-963-11	ELECT 4.7UF	20.00% 50V
C2079	1-164-004-11	CERAMIC CHIP		10.00% 25V	C3116	1-126-964-11	ELECT 10UF	20.00% 50V
C2013	2 202 001 22	VII.12.12 VIII.1						
C2080	1-162-927-11	CERAMIC CHIP	100PF	5.00% 50V	C3117	1-126-964-11	ELECT 10UF	20.00% 50V
C2081	1-163-139-00	CERAMIC CHIP	820PF	5.00% 50V	C3118	1-162-970-11	CERAMIC CHIP 0.01UF	10.00% 25V
C2082	1-163-249-11	CERAMIC CHIP	82PF	5.00% 50V	C3119	1-162-970-11	CERAMIC CHIP 0.01UF	10.00% 25♥
C2083	1-162-964-11	CERAMIC CHIP	0.001UF	10.00% 50V	C3200	1-126-964-11	ELECT 10UF	20.00% 50V
C2084	1-162-962-11	CERAMIC CHIP	470PF	10.00% 50V	C3202	1-126-964-11	ELECT 10UF	20.00% 50V
C2085	1-163-021-91	CERAMIC CHIP	0.01UF	10.00% 50V	C3203	1-126-964-11	ELECT 10UF	20.00% 50V
C2086	1-162-964-11	CERAMIC CHIP		10.00% 50V	C3206	1-126-964-11	ELECT 10UF	20.00% 50V
C2087	1-163-021-91	CERAMIC CHIP		10.00% 50V	C3208	1-163-235-11	CERAMIC CHIP 22PF	5.00% 50V
C2088	1-162-964-11	CERAMIC CHIP		10.00% 50V	C3209	1-163-235-11	CERAMIC CHIP 22PF	5.00% 50V
C2089	1-162-962-11	CERAMIC CHIP		10.00% 50V	C3210	1-126-964-11	ELECT 10UF	20.00% 50V
					İ			
C2090	1-126-947-11	ELECT	47UF	20.00% 35V	C3211	1-126-964-11	ELECT 10UF	20.00% 50V
C2091	1-126-947-11	ELECT	47UF	20.00% 35V	C3212	1-107-826-11	CERAMIC CHIP 0.1UF	10.00% 16V
C2092	1-126-947-11	ELECT	47UF	20.00% 35V	C3213	1-164-222-91	CERAMIC CHIP 0.22UF	25V
C2093	1-126-947-11	ELECT	47UF	20.00% 35V	C3214	1-164-222-91	CERAMIC CHIP 0.22UF	25V
C2094	1-126-947-11	ELECT	47UF	20.00% 35V	C3215	1-164-222-91	CERAMIC CHIP 0.22UF	25V
C2095	1-126-947-11	ELECT	47UF	20.00% 35V	C3216	1-164-222-91	CERAMIC CHIP 0.22UF	25V
	1-162-970-11	CERAMIC CHIP		10.00% 25V	C3217	1-164-222-91	CERAMIC CHIP 0.22UF	25V
C2096	1-126-952-11	ELECT	1000UF	20.00% 35V	C3218	1-164-222-91	CERAMIC CHIP 0.22UF	25V
C2500 C2502	1-126-952-11	ELECT	220UF	20.00% 35V 20.00% 25V	C3219	1-164-222-91	CERAMIC CHIP 0.22UF	25V
C2502	1-164-222-91	CERAMIC CHIP		25V 25V	C3220	1-164-222-91	CERAMIC CHIP 0.22UF	25V
C2304	1-104-222-91	CEMPIC CITI	V.220E	231		2 201 222 72		20.
C2505	1-115-339-11	CERAMIC CHIP	0.1UF	10.00% 50V	C3221	1-164-222-91	CERAMIC CHIP 0.22UF	25V
C2506	1-126-972-11	ELECT	1000UF	20.00% 50♥	C3222	1-164-222-91	CERAMIC CHIP 0.22UF	25V
C2507	1-164-230-11	CERAMIC CHIP	220PF	5.00% 50V	C3223	1-164-222-91	CERAMIC CHIP 0.22UF	25V
C2508	1-164-230-11	CERAMIC CHIP	220PF	5.00% 50V	C3224	1-164-222-91	CERAMIC CHIP 0.22UF	25V
C2509	1-164-230-11	CERAMIC CHIP	220PF	5.00% 50V	C3225	1-164-222-91	CERAMIC CHIP 0.22UF	<b>25</b> V
C2510	1-164-227-11	CERAMIC CHIP	0.022UF	10.00% 25V	C3226	1-164-222-91	CERAMIC CHIP 0.22UF	25V
C2511	1-163-021-91	CERAMIC CHIP		10.00% 50V	C3227	1-164-222-91	CERAMIC CHIP 0.22UF	25V
C2511	1-163-021-91	CERAMIC CHIP		10.00% 50V	C3228	1-164-489-11	CERAMIC CHIP 0.22UF	10.00% 16V
C2512	1-126-952-11	ELECT	1000UF	20.00% 35V	C3229	1-164-489-11	CERAMIC CHIP 0.22UF	10.00% 16V
C2513	1-126-932-11	CERAMIC CHIP		10.00% 25V	C3230	1-164-489-11	CERAMIC CHIP 0.22UF	10.00% 16V
C2313	1-104-77   -11	CERREIC CHIP	V.V220F	TA: AAG TAA	00200	VT TV/ -L	VIIII VILLY	
C2516	1-126-953-11	ELECT	2200UF	20.00% 35V	C3231	1-164-489-11	CERAMIC CHIP 0.22UF	10.00% 16V
C2517	1-126-960-11	ELECT	1UF	20.00% 50V	C3232	1-164-489-11	CERAMIC CHIP 0.22UF	10.00% 16V
C2518	1-126-960-11	ELECT	1UF	20.00% 50V	C3233	1-164-489-11	CERAMIC CHIP 0.22UF	10.00% 16V
C2519	1-126-959-11	ELECT	0.47UF	20.00% 50V	C3234	1-164-489-11	CERAMIC CHIP 0.22UF	10.00% 16V
C2521	1-164-489-11	CERAMIC CHIP	0.22UF	10.00% 16V	C3235	1-165-176-11	CERAMIC CHIP 0.047UF	10.00% 16V



REF.NO.	PART.NO	DESCRIPTION	REMARK	REF.NO.	PART.NO	DESCRIPTION	REMARK
C3236	1-165-176-11	CERAMIC CHIP 0.047UF	10.00% 16V	C5303	1-136-153-00	FILM 0.01UF	5.00% 50V
C3237	1-165-176-11	CERAMIC CHIP 0.047UF	10.00% 16V	C5304	1-164-182-11	CERAMIC CHIP 0.0033UF	10.00% 50V
C3237	1-165-176-11	CERAMIC CHIP 0.047UF	10.00% 16V	C5305	1-165-176-11	CERAMIC CHIP 0.047UF	10.00% 16V
C3239	1-165-176-11	CERAMIC CHIP 0.047UF	10.00% 16V	C5306	1-164-156-11	CERAMIC CHIP 0.1UF	25V
C3239	1-165-176-11	CERAMIC CHIP 0.047UF	10.00% 16V	C5307	1-164-156-11	CERAMIC CHIP 0.1UF	25V
C3240	1-103-170-11	CERAPIC CHIP V.V4/OF	10.000 100	65507	1 104 150 11	CHICANIC CHII V.IVI	251
02041	1-126-933-11	ELECT 100UF	20.00% 16V	C5309	1-162-927-11	CERAMIC CHIP 100PF	5.00% 50V
C3241	1-162-970-11	CERAMIC CHIP 0.01UF	10.00% 25V	C5310	1-136-497-81	FILM 0.10F	5.00% 50V
C3242	1-164-222-91	CERAMIC CHIP 0.22UF	25V	C5311	1-164-156-11	CERAMIC CHIP 0.1UF	25V
C3243	1-163-247-91	CERAMIC CHIP 68PF	5.00% 50V	C5312	1-165-176-11	CERAMIC CHIP 0.047UF	10.00% 16V
C3244	1-163-251-11	CERAMIC CHIP 100PF	5.00% 50V	C5313	1-107-714-11	ELECT 10UF	20.00% 50V
C3245	1-105-251-11	CERAMIC CHIP IVVPP	J.00% J0V	63313	1 10/ /14 11	BHECI IVOI	20.000 504
C3250	1-163-021-91	CERAMIC CHIP 0.01UF	10.00% 50V	C5314	1-162-970-11	CERAMIC CHIP 0.01UF	10.00% 25V
C3250	1-163-251-11	CERAMIC CHIP 100PF	5.00% 50V	C5314	1-164-230-11	CERAMIC CHIP 220PF	5.00% 50V
	1-126-964-11	ELECT 10UF	20.00% 50V	C5318	1-164-156-11	CERAMIC CHIP 0.1UF	25V
C3309 C3310	1-164-222-91	CERAMIC CHIP 0.22UF	25V	C5319	1-136-347-11	FILM 0.0047UF	5.00% 630V
	1-126-947-11	ELECT 47UF	20.00% 35V	C5320	1-129-716-00	FILM 0.015UF	5.00% 630V
C5110	1-120-947-11	EDECI 470F	20.000 334	03320	1 123 /10 00	7.0150E	3.000 0301
AE111	1-126-964-11	ELECT 10UF	20.00% 50V	C5321	1-136-347-11	FILM 0.0047UF	5.00% 630V
C5111	1-126-964-11	ELECT 10UF	20.00% 50V 20.00% 50V	C5322	1-164-156-11	CERAMIC CHIP 0.1UF	25V
C5112		CERAMIC CHIP 0.1UF	20.00% 30V 25V	C5322	1-136-159-00	FILM 0.033UF	5.00% 50V
C5114	1-164-156-11	ELECT 10UF	20.00% 50V	C5400	1-126-964-11	ELECT 10UF	20.00% 50V
C5115	1-126-964-11		20.00% 50V 20.00% 50V	C5400	1-107-714-11	ELECT 10UF	20.00% 50V 20.00% 50V
C5116	1-126-964-11	ELECT 10UF	20.00% 500	C3401	1-10/-/14-11	EMECI IVOT	20.00% 300
AF117	1-126-964-11	ELECT 10UF	20.00% 50V	C5403	1-128-527-11	ELECT 330UF	20.00% 25V
C5117		CERAMIC CHIP 0.1UF	20.00% 30V 25V	C5404	1-102-228-00	CERAMIC 470PF	10.00% 500V
C5118	1-164-156-11	CERAMIC CHIP 0.10F	10.00% 16V	C5405	1-163-021-91	CERAMIC CHIP 0.01UF	10.00% 500V
C5119	1-107-823-11	CERAMIC CHIP 0.470F	10.00% 16V	C5406	1-129-702-00	MYLAR 0.001UF	10.00% 30V
C5120	1-165-176-11	CERAMIC CHIP 0.0470F	10.00% 16V 10.00% 16V	C5400	1-128-527-11	ELECT 330UF	20.00% 25V
C5121	1-165-176-11	CERAMIC CHIP 0.04/01	10.000 100	C3407	1-120-327-11	EDECI 5500F	20.000 254
C5122	1-164-156-11	CERAMIC CHIP 0.1UF	25V	C5409	1-126-968-11	ELECT 100UF	20.00% 50V
C5122	1-164-156-11	CERAMIC CHIP 0.1UF	25V	C5410	1-163-021-91	CERAMIC CHIP 0.01UF	10.00% 50V
	1-126-964-11	ELECT 10UF	20.00% 50V	C5411	1-137-401-11	MYLAR 0.22UF	5.00% 100V
C5125 C5200	1-136-177-00	FILM 1UF	5.00% 50V	C5412	1-106-220-00	MYLAR 0.1UF	10.00% 100V
C5200	1-163-989-11	CERAMIC CHIP 0.033UF	10.00% 25V	C5413	1-130-785-11	MYLAR 0.47UF	5.00% 100V
C5201	1-103-909-11	CERMIC CHIP V.VJJ01	10.000 257	00415	1 150 705 11	22222	3.000 1001
C5202	1-126-947-11	ELECT 47UF	20.00% 35V	C5414	1-126-964-11	ELECT 10UF	20.00% 50V
C5202	1-136-177-00	FILM 1UF	5.00% 50V	C5801	1-126-963-11	ELECT 4.7UF	20.00% 50V
C5203	1-115-339-11	CERAMIC CHIP 0.1UF	10.00% 50V	C5850	1-126-963-11	ELECT 4.7UF	20.00% 50V
C5205	1-163-989-11	CERAMIC CHIP 0.033UF	10.00% 25V	C5851	1-107-826-11	CERAMIC CHIP 0.1UF	10.00% 16V
C5205	1-164-222-91	CERAMIC CHIP 0.22UF	25V	C5853	1-162-970-11	CERAMIC CHIP 0.01UF	10.00% 25V
CJ200	1-104 222 31	OMERICO ONLL VILLOI	201	""			
C5207	1-126-947-11	ELECT 47UF	20.00% 35V	C5854	1-107-826-11	CERAMIC CHIP 0.1UF	10.00% 16V
C5207	1-163-127-00	CERAMIC CHIP 270PF	5.00% 50V	C5858	1-107-826-11	CERAMIC CHIP 0.1UF	10.00% 16V
C5210	1-164-336-11	CERAMIC CHIP 0.33UF	257	C5859	1-126-960-11	ELECT 1UF	20.00% 50V
C5210	1-136-497-81	FILM 0.1UF	5.00% 50V	C5860	1-165-176-11	CERAMIC CHIP 0.047UF	10.00% 16V
C5211	1-164-222-91	CERAMIC CHIP 0.22UF	25V	C5868	1-164-004-11	CERAMIC CHIP 0.1UF	10.00% 25V
CJZIZ	1 104 222 31		20.	*****			20,000
C5213	1-126-947-11	ELECT 47UF	20.00% 35V	C5872	1-164-346-11	CERAMIC CHIP 1UF	16V
C5213	1-126-964-11	ELECT 10UF	20.00% 50V	C5873	1-163-251-11	CERAMIC CHIP 100PF	5.00% 50V
C5214	1-162-923-11	CERAMIC CHIP 47PF	5.00% 50V	C5888	1-164-156-11	CERAMIC CHIP 0.1UF	25V
C5216	1-162-927-11	CERAMIC CHIP 100PF	5.00% 50V	C5889	1-126-964-11	ELECT 10UF	20.00% 50V
C5217	1-136-497-81	FILM 0.1UF	5.00% 50V	C5890	1-164-227-11	CERAMIC CHIP 0.022UF	10.00% 25V
COZII	1-130-431-01	sams V.1VE	3.000				
C5218	1-162-923-11	CERAMIC CHIP 47PF	5.00% 50V	C5891	1-137-581-11	FILM 0.1UF	5.00% 100V
C5218	1-126-964-11	ELECT 10UF	20.00% 50V	C5892	1-107-826-11	CERAMIC CHIP 0.1UF	10.00% 16V
C5219	1-126-933-11	ELECT 100UF	20.00% 36V 20.00% 16V	C5893	1-126-947-11	ELECT 47UF	20.00% 35V
C5300	1-126-947-11	ELECT 47UF	20.00% 15V	C5894	1-126-947-11	ELECT 47UF	20.00% 35V
C5301	1-164-222-91	CERAMIC CHIP 0.22UF	25V	C5895	1-164-156-11	CERAMIC CHIP 0.1UF	25V
<b>03302</b>	* *** *** **	TELEST VINE VINEVE	20.	1			<b></b> ,



REF.NO.	PART.NO	DESCRIPTION	REMARK	REF.NO.	PART.NO	DESCRIPTION	REMARK
C5896	1-165-176-11	CERAMIC CHIP 0.047UF	10.00% 16V	C7067	1-126-947-11	ELECT 47UF	20.00% 35V
C5897	1-162-970-11	CERAMIC CHIP 0.01UF	10.00% 25V	C7068	1-164-222-91	CERAMIC CHIP 0.22	UF 25V
C5898	1-162-964-11	CERAMIC CHIP 0.001UF	10.00% 50V	C7069	1-162-919-11	CERAMIC CHIP 22PF	5.00% 50V
C5899	1-107-823-11	CERAMIC CHIP 0.47UF	10.00% 16V	C7070	1-162-919-11	CERAMIC CHIP 22PF	5.00% 50V
C6200	1-126-933-11	ELECT 100UF	20.00% 16V	C7071	1-162-919-11	CERAMIC CHIP 22PF	
C6200	1-120-355 11	<u> </u>	20.000				
C6201	1-126-935-11	ELECT 470UF	20.00% 16V		< COAT	'ING LEAD >	
C6202	1-126-933-11	ELECT 100UF	20.00% 16V				
C6203	1-126-925-91	ELECT 470UF	20.00% 10V	CLP6	* 4-042-408-02	PIN(45), WIRE	
C6204	1-126-933-11	ELECT 100UF	20.00% 16V				
C6205	1-126-925-91	ELECT 470UF	20.00% 10V		< CONN	IECTOR >	
C6206	1-126-933-11	ELECT 100UF	20.00% 16V	CN0101	* 1-823-330-11	CONNECTOR, BOARD	TO BOARD 40P
C6207	1-126-933-11	ELECT 100UF	20.00% 16V	CN0102	* 1-564-520-11	PLUG, CONNECTOR 5	5P
C6208	1-126-933-11	ELECT 100UF	20.00% 16V	CN0103	* 1-817-035-61	PLUG, CONNECTOR 4	P
C6209	1-126-933-11	ELECT 100UF	20.00% 16V	CN1000	* 1-417-319-11	CONNECTOR (SQUARE	TYPE) 21P
C6210	1-126-935-11	ELECT 470UF	20.00% 16V	CN1001	* 1-766-296-41	CONNECTOR, DUAL S	CART
00011	1-126-947-11	ELECT 47UF	20.00% 35V	CN2000	* 1-564-512-11	PLUG, CONNECTOR S	)P
C6211	1-126-933-11	ELECT 100UF	20.00% 35V	CN2500	* 1-816-974-51	PLUG, CONNECTOR 3	
C6212	1-126-933-11	ELECT 100UF	20.00% 16V	CN2501	* 1-564-507-11	PLUG, CONNECTOR 4	
C6213		ELECT 1000F	20.00% 16V	CN2502	* 1-816-977-51	PLUG, CONNECTOR (	
C6214	1-126-933-11	ELECT 47UF	20.00% 15V 20.00% 35V	CN2502	* 1-816-984-71	PLUG, CONNECTOR	
C7002	1-126-947-11	ELECT 4/OF	20.00% 554	CHOUZ	1 010 304 71	1200, Consideration	·•
C7004	1-164-222-91	CERAMIC CHIP 0.22UF	25V	CN5100	* 1-816-974-51	PLUG, CONNECTOR 3	3P
C7008	1-162-919-11	CERAMIC CHIP 22PF	5.00% 50V	CN5200	* 1-564-506-11	PLUG, CONNECTOR 3	BP .
C7016	1-107-823-11	CERAMIC CHIP 0.47UF	10.00% 16V	CN5801	1-764-333-11	PIN, CONNECTOR (PO	CB) (V TYPE) 10P
C7018	1-164-004-11	CERAMIC CHIP 0.1UF	10.00% 25V	CN6200	* 1-564-507-11	PLUG, CONNECTOR 4	lP
C7019	1-164-004-11	CERAMIC CHIP 0.1UF	10.00% 25V	CN6202	* 1-564-516-11	PLUG, CONNECTOR 1	L3P
C7020	1-164-004-11	CERAMIC CHIP 0.1UF	10.00% 25V	CN6203	1-695-915-11	TAB (CONTACT)	
C7020	1-164-004-11	CERAMIC CHIP 0.1UF	10.00% 25V	CN7000	* 1-817-044-81	PLUG, CONNECTOR	7P
C7021	1-164-004-11	CERAMIC CHIP 0.1UF	10.00% 25V	CN7001	* 1-564-512-11	PLUG, CONNECTOR S	
C7022	1-164-004-11	CERAMIC CHIP 0.1UF	10.00% 25V	CN8001	1-766-281-11	PIN, CONNECTOR (1	
C7023	1-164-004-11	CERAMIC CHIP 0.1UF	10.00% 25V	"""	_, , , , , , , , , , , , , , , , , , ,		,
C/030	1-104-004.11	CHAMIC CHII V.101	201000 201		< DIO	DE >	
C7031	1-164-004-11	CERAMIC CHIP 0.1UF	10.00% 25V				
C7032	1-164-004-11	CERAMIC CHIP 0.1UF	10.00% 25V	D0101	8-719-921-88	DIODE MTZJ-13B	
C7038	1-107-823-11	CERAMIC CHIP 0.47UF	10.00% 16V	D0104	8-719-109-89	DIODE RD5.6ESB2	
C7039	1-162-966-11	CERAMIC CHIP 0.0022U	10.00% 50V	D0110	8-719-109-89	DIODE RD5.6ESB2	
C7050	1-162-927-11	CERAMIC CHIP 100PF	5.00% 50V	D0111	8-719-929-15	DIODE HZS9.1NB2	
				D0112	8-719-921-88	DIODE MTZJ-13B	
C7051	1-164-004-11	CERAMIC CHIP 0.1UF	10.00% 25V				
C7052	1-164-004-11	CERAMIC CHIP 0.1UF	10.00% 25V	D0113	8-719-921-88	DIODE MTZJ-13B	
C7053	1-164-004-11	CERAMIC CHIP 0.1UF	10.00% 25V	D1002	8-719-050-38	DIODE M1MA152WK-	!1
C7054	1-126-963-11	ELECT 4.7UF	20.00% 50V	D2014	8-719-929-15	DIODE HZS9.1NB2	
C7055	1-164-222-91	CERAMIC CHIP 0.22UF	25V	D2015	8-719-929-15	DIODE HZS9.1NB2	
				D2016	8-719-050-38	DIODE M1MA152WK-	11
C7056	1-126-933-11	ELECT 100UF	20.00% 16V		0 540 000 45	BEARE 2200 1900	
C7057	1-164-222-91	CERAMIC CHIP 0.22UF	25V	D2018	8-719-929-15	DIODE HZS9.1NB2	
C7058	1-126-933-11	ELECT 100UF	20.00% 16V	D2019	8-719-929-15	DIODE HZS9.1NB2	n1
C7059	1-126-933-11	ELECT 100UF	20.00% 16V	D2500	8-719-050-38	DIODE M1MA152WK-1	11
C7060	1-164-222-91	CERAMIC CHIP 0.22UF	25V	D2502	8-719-109-89	DIODE RD5.6ESB2	n1
07061	1-164-004-11	CERAMIC CHIP 0.1UF	10.00% 25V	D2503	8-719-050-38	DIODE M1MA152WK-	11
C7061	1-164-004-11	CERAMIC CHIP 0.1UF	10.00% 25V	D3001	8-719-929-15	DIODE HZS9.1NB2	
C7062	1-164-004-11	CERAMIC CHIP 0.1UF	10.00% 25V	D3003	8-719-929-15	DIODE HZS9.1NB2	
C7063	1-164-004-11	ELECT 47UF	20.00% 35V	D3005	8-719-929-15	DIODE HZS9.1NB2	
C7064	1-126-947-11	CERAMIC CHIP 0.22UF	20.00% 35V 25V	D3007	8-719-109-89	DIODE RD5.6ESB2	
C7065	1-104-222-31	CERMIT CHIP V.22UF	234	1 23007	5 125 205 05		

REF.NO.	PART.NO	DESCRIPTION	REMARK	REF.NO.	PART.NO	DESCRIPTION		REMARK
D3008	8-719-109-89	DIODE RD5.6ESB2			< IC >			
D3009	8-719-929-15	DIODE HZS9.1NB2						
D3011	8-719-929-15	DIODE HZS9.1NB2		IC1001	6-704-747-01	IC TDA9886TS	/V <b>4</b> B	
D3013	8-719-929-15	DIODE HZS9.1NB2		IC2000	6-701-031-11	IC MSP3411G-	QA-B11	
D3015	8-719-929-15	DIODE HZS9.1NB2		IC2001	8-759-100-96	IC UPC4558G2	!	
				IC2500	8-759-831-56	IC TDA7497		
D3017	8-719-109-89	DIODE RD5.6ESB2		IC3100	6-700-504-01	IC SDA9488X-	B23GEG	
D3018	8-719-109-89	DIODE RD5.6ESB2						
D3019	8-719-929-15	DIODE HZS9.1NB2		IC3200	6-706-076-01	IC VSP9402A-	VK-B13G	
D3021	8-719-929-15	DIODE HZS9.1NB2		IC5103	8-752-072-94	IC CXA1875AN		
D3023	8-719-109-89	DIODE RD5.6ESB2		IC5104	8-759-803-42	IC LA6500-FA		
				IC5200	8-759-595-52	IC CXA8070AI	)	
D3024	8-719-929-15	DIODE HZS9.1NB2		IC5201	6-701-046-01	IC LM318N		
D3026	8-719-929-15	DIODE HZS9.1NB2				CFA		
D3028	8-719-929-15	DIODE HZS9.1NB2		IC5300	8-759-008-70	IC LM358N		
D3201	8-719-109-89	DIODE RD5.6ESB2		IC5301	8-759-659-67	IC LA6393DLI	•	
D5103	8-719-110-86	DIODE RD39ESB		IC5302	8-759-659-67	IC LA6393DLI IC STV9379A	ı	
DF104	0 710 100 00	DIODE RD5.6ESB2		IC5400 IC6200	8-759-696-71 8-759-648-19	IC 5TV9379A IC L7809CV/I	ev	
D5104 D5200	8-719-109-89 8-719-991-33	DIODE 1SS133T-77		100200	0-/33-040-13	IC 11/003CV/1	191	
D5200 D5201	1-535-303-00	LEAD, JUMPER (5.0MM)		IC6201	8-759-648-20	IC L7805CV/I	.ev	
D5201 D5202	8-719-050-38	DIODE M1MA152WK-T1		IC6202	8-759-445-59	IC BA033T	io i	
D5202 D5300	8-719-081-97	DIODE MMDL914T1		IC6203	8-759-098-24	IC PQ30RV11		
<b>D</b> 3300	0 /13 001 3/	J1000 1100011111		IC6204	8-759-591-02	IC L78L33ABZ	-AP	
D5303	8-719-081-97	DIODE MMDL914T1		IC6205	8-759-394-35	IC BA12T		
D5304	8-719-081-97	DIODE MMDL914T1						
D5305	8-719-991-33	DIODE 1SS133T-77		IC6206	8-759-991-41	IC LM78L05AC	:Z	
D5306	8-719-302-43	DIODE EL1Z		IC7002	8-752-090-88	IC CXA2100AQ	-TL	
D5307	8-719-987-87	DIODE ERA85-009		·				
					< SOCKE	T >		
D5308	8-719-081-97	DIODE MMDL914T1						
D5309	8-719-081-97	DIODE MMDL914T1		J2000	1-784-632-11	JACK, PIN 2E	•	
D5400	8-719-982-03	DIODE MTZJ-3.6A						
D5401	8-719-050-38	DIODE M1MA152WK-T1			< COIL	>		
D5404	8-719-110-41	DIODE RD15ESB2						
				L1001	1-412-987-31	INDUCTOR	4.7UH	
D5405	8-719-908-03	DIODE GP08D		L1002	1-412-987-31	INDUCTOR	4.7UH	
D5406	8-719-081-97	DIODE MMDL914T1		L1003	1-414-934-21	INDUCTOR	10UH	
D5407	8-719-081-97	DIODE MMDL914T1		L1004	1-216-864-11	SHORT CHIP	0	
D5804	8-719-109-89	DIODE RD5.6ESB2		L1005	1-216-864-11	SHORT CHIP	0	
D5807	8-719-929-15	DIODE HZS9.1NB2		L1009	1-216-864-11	SHORT CHIP	0	
DEGOO	0 710 050-20	DIODE M1MA152WK-T1		L1009	1-216-864-11	SHORT CHIP	0	
D5809	8-719-050-38 8-719-081-97	DIODE MMDL914T1		L1010	1-216-864-11	SHORT CHIP	0	
D5811 D5812	8-719-081-97 8-719-081-97	DIODE MMDL914T1		L1011	1-216-864-11	SHORT CHIP	0	
D5812	8-719-081-97	DIODE MMDL914T1		L1013	1-216-864-11	SHORT CHIP	0	
D5814	1-216-295-91	SHORT CHIP 0		11111	1 220 001 12	DIIONI GIIII	V	
20017	1 210 255 51	V		L2000	1-414-934-21	INDUCTOR	10UH	
D6200	8-719-063-70	DIODE D1NL20U		L2001	1-414-934-21	INDUCTOR	10UH	
D7004	8-719-929-15	DIODE HZS9.1NB2		L2007	1-408-602-31	INDUCTOR	8.2UH	
				L2008	1-216-295-91	SHORT CHIP	0	
	< FERR	RITE BEAD >		L2009	1-216-295-91	SHORT CHIP	0	
FB3001	1-414-760-21	FERRITE OUH		L2010	1-414-928-21	INDUCTOR	1UH	
				L2012	1-414-934-21	INDUCTOR	10UH	
	< FILT	ER >		L2013	1-414-928-21	INDUCTOR	1UH	
				L2014	1-408-602-31	INDUCTOR	8.2UH	
FL2000	1-239-803-11	FILTER, EMI		L2500	1-535-303-00	LEAD, JUMPER	(5.0MM)	
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Note: The components identified by shading and marked △ are critical for safety. Replace only with the part numbers specified in the parts list.



REF.NO.	PART.NO	DESCRIPTION	REMARK	REF.NO.	PART.NO	DESCRIPTION	REMARK
L2501	1-535-303-00	LEAD, JUMPER		Q2002	8-729-010-29	TRANSISTOR MS	D601-RST1
L3000	1-216-295-91	SHORT CHIP	0	Q2003	8-729-010-29	TRANSISTOR MS	D601-RST1
L3004	1-216-295-91	SHORT CHIP	0	Q2004	8-729-010-29	TRANSISTOR MS	D601-RST1
L3005	1-216-295-91	SHORT CHIP	0	Q2005	8-729-010-29	TRANSISTOR MS	D601-RST1
L3006	1-216-295-91	SHORT CHIP	0	Q2501	8-729-010-29	TRANSISTOR MS	D601-RST1
L3007	1-216-295-91	SHORT CHIP	0	Q2502	8-729-010-29	TRANSISTOR MS	D601-RST1
L3008	1-216-295-91	SHORT CHIP	0	Q2503	8-729-010-29	TRANSISTOR MS	
L3009	1-216-295-91	SHORT CHIP	0	Q2504	8-729-010-05	TRANSISTOR MS	B709-RT1
L3010	1-216-295-91	SHORT CHIP	0	Q3200	8-729-010-29	TRANSISTOR MS	
L3011	1-216-295-91	SHORT CHIP	0	Q3201	8-729-010-29	TRANSISTOR MS	D601-RST1
L3012	1-216-295-91	SHORT CHIP	0	Q3202	8-729-010-05	TRANSISTOR MS	B709-RT1
L3105	1-412-006-31	INDUCTOR	10UH	Q3204	8-729-010-05	TRANSISTOR MS	B709-RT1
L3106	1-412-006-31	INDUCTOR	10UH	Q3300	8-729-010-05	TRANSISTOR MS	B709-RT1
L3107	1-412-006-31	INDUCTOR	10UH	Q3301	8-729-010-05	TRANSISTOR MS	B709-RT1
L3200	1-412-006-31	INDUCTOR	10UH	Q3302	8-729-010-05	TRANSISTOR MS	B709-RT1
L3202	1-412-006-31	INDUCTOR	10UH	Q3500	8-729-028-28	TRANSISTOR 2S	K2036 (TE85L)
L3203	1-412-006-31	INDUCTOR	10UH	Q3501	8-729-028-28	TRANSISTOR 2S	
L3206	1-412-006-31	INDUCTOR	10UH	Q5101	8-729-010-29	TRANSISTOR MS	D601-RST1
L3208	1-412-006-31	INDUCTOR	10UH	Q5200	8-729-010-29	TRANSISTOR MS	D601-RST1
L3209	1-216-864-11	SHORT CHIP	0	Q5201	8-729-010-29	TRANSISTOR MS	D601-RST1
L3300	1-412-006-31	INDUCTOR	10UH	Q5202	8-729-045-04	TRANSISTOR 2S	C5511
L5300	1-406-989-21	INDUCTOR	10MH	Q5203	8-729-044-59		A1837 (LBS2SONY)
L5301	1-406-989-21	INDUCTOR	10MH	Q5204	8-729-010-05	TRANSISTOR MS	
L5400	1-412-524-11	INDUCTOR	8.2UH	Q5205	8-729-010-05	TRANSISTOR MS	
L5896	1-216-864-11	SHORT CHIP	0	Q5300	8-729-010-29	TRANSISTOR MS	
<b>1</b> 5897	1-216-864-11	SHORT CHIP	0	Q5301	8-729-053-33	TRANSISTOR IR	F614-037
L5898	1-414-934-21	INDUCTOR	10UH	Q5302	8-729-140-97	TRANSISTOR 2S	
L5899	1-414-934-21	INDUCTOR	10UH	Q5303	8-729-010-29	TRANSISTOR MS	D601-RST1
L7001	1-414-934-21	INDUCTOR	10UH	Q5304	8-729-010-29	TRANSISTOR MS	D601-RST1
L7009	1-414-934-21	INDUCTOR	10UH	Q5305	8-729-119-78	TRANSISTOR 2S	C2785-HFE
L7010	1-414-934-21	INDUCTOR	10UH	Q5306	8-729-140-97	TRANSISTOR 2S	B734-34
L7011	1-414-934-21	INDUCTOR	10UH	Q5400	8-729-010-29	TRANSISTOR MS	D601-RST1
L7012	1-414-934-21	INDUCTOR	10UH	Q5401	8-729-421-19	TRANSISTOR UN	2213
1,412	2 424 504 82	2		Q5402	8-729-010-05	TRANSISTOR MS	B709-RT1
	< PRO	TECTOR MODULE >		Q5403	8-729-421-19	TRANSISTOR UN	2213
PS2501	△ 1-533-597-31	IC LINK	5A 90V	Q5404	8-729-926-76	TRANSISTOR IR	<b>F</b> 620
				Q5813	8-729-421-19	TRANSISTOR UN	2213
	< TRA	NSISTOR >		Q5814	8-729-010-05	TRANSISTOR MS	B709-RT1
				Q5815	8-729-010-29	TRANSISTOR MS	D601-RST1
Q1000	8-729-010-05	TRANSISTOR MS	B709-RT1	Q5816	8-729-010-05	TRANSISTOR MS	B709-RT1
Q1001	8-729-010-29	TRANSISTOR MS		1			
Q1002	8-729-421-19	TRANSISTOR UN		Q6201	8-729-140-97	TRANSISTOR 2S	B734-34
Q1003	8-729-421-19	TRANSISTOR UN		Q7003	8-729-010-29	TRANSISTOR MS	D601-RST1
Q1004	8-729-422-33	TRANSISTOR 2S		Q7009	8-729-010-05	TRANSISTOR MS	B709-RT1
<b>*</b>			-	Q7011	8-729-010-05	TRANSISTOR MS	B709-RT1
Q1005	8-729-421-19	TRANSISTOR UN	2213	Q7012	8-729-010-05	TRANSISTOR MS	B709-RT1
Q1005 Q1006	8-729-010-05	TRANSISTOR MS		-			
Q1008	8-729-421-19	TRANSISTOR UN		Q7013	8-729-010-29	TRANSISTOR MS	D601-RST1
Q1000	8-729-010-05	TRANSISTOR MS		Q7014	8-729-010-05	TRANSISTOR MS	
Q2000	8-729-010-09	TRANSISTOR MS		Q7015	8-729-010-05	TRANSISTOR MS	
Z-000	0 125 010 25			Q7016	8-729-010-29	TRANSISTOR MS	
Q2001	8-729-010-29	TRANSISTOR MS	D601-RST1	Q7017	8-729-010-05	TRANSISTOR MS	
				•			



REF.NO.	PART.NO	DESCRIPTION		REMARK	REF.NO.	PART.NO	DESCRIPTION			REMARK
Q7018	8-729-010-05	TRANSISTOR MSB7	09-RT1		R1037	1-216-829-11	METAL CHIP	4.7K	5%	1/10W
Q7019	8-729-010-29	TRANSISTOR MSD6	01-RST1		R1038	1-216-833-11	METAL CHIP	10K	5%	1/10W
21025	• 120 121				R1039	1-216-801-11	METAL CHIP	22	5%	1/10W
	< RESI	ISTOR >			R1041	1-216-812-11	METAL CHIP	180	5%	1/10W
					R1042	1-216-821-11	METAL CHIP	1K	5%	1/10W
JR105	1-216-295-91	SHORT CHIP 0								•
JR121	1-216-864-11	SHORT CHIP 0			R1045	1-216-864-11	SHORT CHIP	0		
JR123	1-216-864-11	SHORT CHIP 0			R1046	1-216-809-11	METAL CHIP	100	5%	1/10W
JR134	1-216-295-91	SHORT CHIP 0			R1047	1-216-817-11	METAL CHIP	470	5%	1/10W
JR1003	1-216-864-11	SHORT CHIP 0			R1048	1-216-834-11	METAL CHIP	12K	5%	1/10W
UKIVUJ					R1050	1-216-809-11	METAL CHIP	100	5%	1/10W
JR1004	1-216-864-11	SHORT CHIP 0								
JR1009	1-216-864-11	SHORT CHIP 0			R1051	1-216-809-11	METAL CHIP	100	5%	1/10W
JR2000	1-216-295-91	SHORT CHIP 0			R1052	1-216-845-11	METAL CHIP	100K	5%	1/10W
0142000	2 220 200 00				R2009	1-216-817-11	METAL CHIP	470	5%	1/10W
R0101	1-216-833-11	METAL CHIP 1	0K 5%	1/10W	R2010	1-216-817-11	METAL CHIP	470	5%	1/10W
R0102	1-216-827-11		.3K 5%	1/10W	R2011	1-216-049-11	RES-CHIP	1K	5%	1/10W
R0102	1-216-073-91		0K 5%	1/10W						•
R0103	1-216-827-11		.3K 5%	1/10W	R2014	1-216-049-11	RES-CHIP	1K	5%	1/10W
R0105	1-216-025-11		00 5%	1/10W	R2015	1-216-295-91	SHORT CHIP	0		•
K0103	1 210 023 11	-		-,	R2017	1-216-853-11	METAL CHIP	470K	5%	1/10W
R0107	1-216-025-11	RES-CHIP 1	00 5%	1/10W	R2018	1-216-295-91	SHORT CHIP	0	-	_,
R1000	1-216-049-11		K 5%	1/10W	R2020	1-216-853-11	METAL CHIP	470K	5%	1/10W
	1-216-001-00		0 5%	1/10W		2 220 000 22		.,	••	_,
R1001	1-216-821-11		K 5%	1/10W	R2023	1-216-853-11	METAL CHIP	470K	5%	1/10W
R1002	1-216-864-11	SHORT CHIP (		1/ 1011	R2026	1-216-853-11	METAL CHIP	470K	5%	1/10W
R1004	1-210-004-11	SHOKI CHII			R2029	1-216-853-11	METAL CHIP	470K	5%	1/10W
<b>5100</b> F	1-216-049-11	RES-CHIP 1	K 5%	1/10W	R2032	1-216-853-11	METAL CHIP	470K	5%	1/10W
R1005	1-216-051-00		.2K 5%	1/10W	R2035	1-216-853-11	METAL CHIP		5%	1/10W
R1006	1-216-809-11		.21 5%	1/10W	12033	1 210 033 11	maran curi	47040	J 0	1,100
R1007		SHORT CHIP (		1/10#	R2038	1-216-853-11	METAL CHIP	470K	5%	1/10W
R1008	1-216-864-11		2K 5%	1/10W	R2030	1-216-853-11	METAL CHIP	470K	5%	1/10W
R1009	1-216-837-11	MEIAL CHIP 2	2K 35	I/ IVN	R2041	1-216-829-11	METAL CHIP		5%	1/10W
-4.444	1 016 00E 11	METAL CHIP 2	.2K 5%	1/10W	R2042	1-216-829-11	METAL CHIP		5%	1/10W
R1011	1-216-825-11 1-216-825-11		.2K 5%	1/10W	R2044	1-216-853-11	METAL CHIP	470K		1/10W
R1013			.2K 5%	1/10W	12044	1-210-055 11	MILLI CHIL	47011	•	1/101
R1014	1-216-825-11 1-216-817-11		70 5%	1/10W	R2047	1-216-853-11	METAL CHIP	470K	5&	1/10W
R1016	1-216-830-11		.6K 5%	1/10W	R2048	1-216-837-11	METAL CHIP	22K	5%	1/10W
R1018	1-210-030-11	MEIAL CHIP	. UK 30	1/108	R2050	1-216-845-11	METAL CHIP	100K	5%	1/10W
<b>-1010</b>	1 016 007_11	METAL CHIP 3	.3K 5%	1/10W	R2051	1-216-049-11	RES-CHIP	1K	5%	1/10W
R1019	1-216-827-11		50 5%	1/10W	R2052	1-216-837-11	METAL CHIP	22K	5%	1/10W
R1020	1-216-811-11 1-216-833-11		OK 5%	1/10W	RZUJZ	1-210-057-11	HISTAU CHIL	2211	J.0	1/ 1011
R1021	1-216-839-11		3K 5%	1/10W	R2053	1-216-817-11	METAL CHIP	470	5%	1/10W
R1022			20K 5%	1/10W	R2054	1-216-049-11	RES-CHIP	1K	5%	1/10W
R1023	1-216-849-11	MEIAL CRIP 2	20K 38	1/10#	R2055	1-216-049-11	RES-CHIP	1K	5%	1/10W
<b>-1004</b>	1 016 020 11	METAL CHIP 3	3K 5%	1/10W	R2056	1-216-815-11	METAL CHIP	330	5%	1/10W
R1024	1-216-839-11 1-216-837-11		2K 5%	1/10W	R2057	1-216-025-11	RES-CHIP	100	5%	1/10W
R1025	1-216-817-11		70 5%	1/10W	12037	1 210 023 11	ing chii	200	•	2, 2011
R1026			.8K 5%	1/10W	R2058	1-216-025-11	RES-CHIP	100	5%	1/10W
R1027	1-216-824-11		.on 5%	1/10W 1/10W	R2059	1-216-829-11	METAL CHIP	4.7K		1/10W
R1028	1-216-813-11	METAL CHIP 2	20 30	1/10M	R2059	1-216-829-11	METAL CHIP	4.7K		1/10W
m1 600	1 016 000 11	METAL CHIP 1	00 5%	1/10W	R2060 R2061	1-216-829-11	METAL CHIP	4.7K		1/10W 1/10W
R1029	1-216-809-11			1/10W 1/10W	R2061 R2062	1-216-829-11	METAL CHIP	4.7K		1/10W 1/10W
R1030	1-216-819-11		80 5% .2K 5%		R2002	1-710-073-11	MEIND CHIP	4./1	Jo	1/ 1V#
R1032	1-216-822-11			1/10W	<b>DONCO</b>	1-216-829-11	METAL CHIP	4.7K	E2	1/10W
R1033	1-218-867-11		.8K 0.5		R2063 R2064	1-216-829-11	CARBON	4.7K		1/10W 1/4W
R1034	1-216-807-11	METAL CHIP 6	8 5%	1/10W	R2064 R2065	1-249-425-11	METAL CHIP	22K	ეგ 5%	1/4W 1/10W
-440-	1 010 007 11	Memat outs of	O E0.	1/10W	R2065 R2066	1-216-837-11	METAL CHIP	4.7K		1/10W 1/10W
R1035	1-216-807-11		8 5% 70 5%	1/10W 1/10W	R2066	1-216-829-11	METAL CHIP	4.7K		1/10W 1/10W
R1036	1-216-814-11	METAL CHIP 2	10 Jt	T/ TOM	1 2007	1 210-023-11	rminu Chir	-4 . /A	J 0	±/ ±VII



REF.NO.	PART.NO	DESCRIPTION		RE	MARK	REF.NO.	PART.NO	DESCRIPTION		R	EMARK
	1-216-049-11	RES-CHIP	1K	5%	1/10W	R2930	1-216-295-91	SHORT CHIP	0		
R2068	1-216-837-11	METAL CHIP	22K	5%	1/10W	R2933	1-216-295-91	SHORT CHIP	0		
R2069		METAL CHIP	10K	5%	1/10W	R2936	1-216-295-91	SHORT CHIP	0		
R2070	1-216-833-11	METAL CHIP	33K	5%	1/10W	R2939	1-216-295-91	SHORT CHIP	0		
R2071	1-216-839-11			5%	1/10W	1	1-216-295-91	SHORT CHIP	0		
R2072	1-216-049-11	RES-CHIP	1K	34	I/IUW	R2942	1-210-295-91	SHOKI CHIP	V		
R2073	1-216-049-11	RES-CHIP	1K	5%	1/10W	R2945	1-216-295-91	SHORT CHIP	0		
R2074	1-216-837-11	METAL CHIP	22K	5%	1/10W	R3000	1-216-025-11	RES-CHIP	100	5%	1/10W
R2075	1-216-833-11	METAL CHIP	10K	5%	1/10W	R3001	1-216-022-00	RES-CHIP	75	5%	1/10W
R2076	1-216-839-11	METAL CHIP	33K	5%	1/10W	R3009	1-216-025-11	RES-CHIP	100	5%	1/10W
R2077	1-216-049-11	RES-CHIP	1K	5%	1/10W	R3010	1-216-022-00	RES-CHIP	75	5%	1/10W
R2078	1-216-025-11	RES-CHIP	100	5%	1/10W	R3011	1-216-025-11	RES-CHIP	100	5%	1/10W
R2079	1-216-049-11	RES-CHIP	1K	5%	1/10W	R3012	1-216-022-00	RES-CHIP	75	5%	1/10W
R2080	1-218-867-11	METAL CHIP	6.8K	0.5%	1/10W	R3013	1-216-025-11	RES-CHIP	100	5%	1/10W
R2081	1-216-833-11	METAL CHIP	10K	5%	1/10W	R3014	1-216-022-00	RES-CHIP	75	5%	1/10W
R2082	1-216-031-00	RES-CHIP	180	5%	1/10W	R3015	1-216-022-00	RES-CHIP	75	5%	1/10W
<b>50000</b>	1-216-817-11	METAL CHIP	470	5%	1/10W	R3016	1-216-025-11	RES-CHIP	100	5%	1/10W
R2083	1-216-837-11	METAL CHIP	22K	5%	1/10W	R3017	1-216-022-00	RES-CHIP	75	5%	1/10W
R2084	1-216-837-11	METAL CHIP	22K	5%	1/10W	R3018	1-216-025-11	RES-CHIP	100	5%	1/10W
R2085	1-216-837-11	METAL CHIP	22K	5%	1/10W	R3019	1-216-022-00	RES-CHIP	75	5%	1/10W
R2086		METAL CHIP	22K	5% 5%	1/10W	R3020	1-216-025-11	RES-CHIP	100	5%	1/10W
R2087	1-216-837-11	METAL CHIP	221	J**	1/108	13020	1 210 023 11	100 0011		••	_,
R2088	1-216-041-00	RES-CHIP	470	5%	1/10W	R3021	1-216-022-00	RES-CHIP	75	5%	1/10W
R2089	1-216-041-00	RES-CHIP	470	5%	1/10W	R3022	1-216-025-11	RES-CHIP	100	5%	1/10W
R2092	1-216-039-00	RES-CHIP	390	5%	1/10W	R3023	1-216-022-00	RES-CHIP	75	5%	1/10W
R2093	1-216-039-00	RES-CHIP	390	5%	1/10W	R3024	1-216-025-11	RES-CHIP	100	5%	1/10W
R2094	1-216-039-00	RES-CHIP	390	5%	1/10W	R3025	1-216-022-00	RES-CHIP	75	5%	1/10W
R2095	1-216-039-00	RES-CHIP	390	5%	1/10W	R3026	1-216-022-00	RES-CHIP	75	5%	1/10W
R2095 R2096	1-216-039-00	RES-CHIP	390	5%	1/10W	R3027	1-216-025-11	RES-CHIP	100	5%	1/10W
R2096 R2097	1-216-039-00	RES-CHIP	390	5%	1/10W	R3028	1-216-022-00	RES-CHIP	75	5%	1/10W
	1-216-049-11	RES-CHIP	1K	5%	1/10W	R3029	1-216-045-00	RES-CHIP	680	5%	1/10W
R2098 R2099	1-216-049-11	RES-CHIP	1K	5%	1/10W	R3030	1-216-022-00	RES-CHIP	75	5%	1/10W
12000											4 /4 0==
R2500	1-216-073-91	RES-CHIP	10K	5%	1/10W	R3031	1-216-022-00	RES-CHIP	75	5%	1/10W
R2501	1-216-341-11	METAL OXIDE	0.22		1W	R3032	1-216-022-00	RES-CHIP	75	5%	1/10W
R2502	1-208-810-11	METAL CHIP	15K		1/10W	R3033	1-216-025-11	RES-CHIP	100	5%	1/10W
R2503	1-208-810-11	METAL CHIP	15K	0.5%	1/10W	R3034	1-216-022-00	RES-CHIP	75	5%	1/10W
R2504	1-216-049-11	RES-CHIP	1K	5%	1/10W	R3035	1-216-025-11	RES-CHIP	100	5%	1/10W
R2507	1-216-837-11	METAL CHIP	22K	5%	1/10W	R3036	1-216-022-00	RES-CHIP	75	5%	1/10W
R2509	1-249-417-11	CARBON	1K	5%	1/4W	R3037	1-216-045-00	RES-CHIP	680	5%	1/10W
R2511	1-216-073-91	RES-CHIP	10K	5%	1/10W	R3104	1-216-295-91	SHORT CHIP	0		
R2516	1-216-081-00	RES-CHIP	22K	5%	1/10W	R3110	1-216-025-11	RES-CHIP	100	5%	1/10W
R2517	1-216-841-11	METAL CHIP	47K	5%	1/10W	R3111	1-216-025-11	RES-CHIP	100	5%	1/10W
20510	1-216-049-11	RES-CHIP	1K	5%	1/10W	R3112	1-216-295-91	SHORT CHIP	0		
R2518	1-216-833-11	METAL CHIP	10K	5%	1/10W	R3218	1-216-821-11	METAL CHIP	1K	5%	1/10W
R2519	1-216-633-11	RES-CHIP	100	5%	1/10W	R3219	1-216-821-11	METAL CHIP	1K	5%	1/10W
R2520	1-216-833-11	METAL CHIP	100 10K	5%	1/10W	R3220	1-216-837-11	METAL CHIP	22K	5%	1/10W
R2524		METAL CHIP	3.9K		1/10W	R3221	1-216-837-11	METAL CHIP	22K	5%	1/10W
R2525	1-216-828-11	MEIND CHIP	J. JA	J.0	±/ ±Vff	27221	T 210 00/-11	and that			
R2912	1-216-295-91	SHORT CHIP	0			R3222	1-216-837-11	METAL CHIP	22K	5%	1/10W
R2914	1-216-853-11	METAL CHIP	470K	5%	1/10W	R3223	1-216-837-11	METAL CHIP	22K	5%	1/10W
R2921	1-216-295-91	SHORT CHIP	0			R3225	1-216-025-11	RES-CHIP	100	5%	1/10W
R2924	1-216-295-91	SHORT CHIP	0			R3226	1-216-025-11	RES-CHIP	100	5%	1/10W
R2927	1-216-295-91	SHORT CHIP	0			R3229	1-216-025-11	RES-CHIP	100	5%	1/10W



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Ē	REF.NO.	PART.NO	DESCRIPTION		F	REMARK	REF.NO.	PART.NO	DESCRIPTION			EMARK	
F	3230	1-216-025-11	RES-CHIP	100	5%	1/10W	R5203	1-216-825-11	METAL CHIP	2.2K		1/10W	
F	3233	1-216-821-11	METAL CHIP	1K	5%	1/10W	R5204	1-216-809-11	METAL CHIP	100	5%	1/10W	
F	3234	1-216-821-11	METAL CHIP	1K	5%	1/10W	R5206	1-216-061-91	RES-CHIP	3.3K	5%	1/10W	
I	3235	1-216-822-11	METAL CHIP	1.2K	5%	1/10W	R5207	1-216-057-00	RES-CHIP	2.2K	5%	1/10W	
I	3236	1-216-822-11	METAL CHIP	1.2K	5%	1/10W	R5208	1-212-849-00	FUSIBLE	4.7	5%	1/4W	
. 1	3237	1-216-797-11	METAL CHIP	10	5%	1/10W	R5209	1-216-809-11	METAL CHIP	100	5%	1/10W	
	3238	1-216-797-11	METAL CHIP	10	5%	1/10W	R5210	1-216-845-11	METAL CHIP	100K	5%	1/10W	
	R3305	1-216-025-11	RES-CHIP	100	5%	1/10W	R5211	1-216-845-11	METAL CHIP	100K		1/10W	
	R3306	1-216-025-11	RES-CHIP	100	5%	1/10W	R5214	1-208-798-11	METAL CHIP		0.5%		
	R3312	1-216-825-11	METAL CHIP	2.2K		1/10W	R5215	1-216-025-11	RES-CHIP	100	5%	1/10W	
,	R3313	1-216-825-11	METAL CHIP	2.2K	5%	1/10W	R5217	1-216-825-11	METAL CHIP	2.2K	5%	1/10W	
		1-216-825-11	METAL CHIP		5%	1/10W	R5217	1-260-321-51	CARBON	270	5%	1/2W	
	R3314			100	5%	1/10W	3		METAL CHIP	4.7K	0.5%		
	R3318	1-216-025-11	RES-CHIP		ა 5%		R5219	1-208-798-11		100	5%	2W	
	R3319	1-216-025-11	RES-CHIP	100		1/10W	R5220	1-215-886-11	METAL OXIDE				
·	R3320	1-216-025-11	RES-CHIP	100	5%	1/10W	R5222	1-218-874-11	METAL CHIP	13K	V.5*	1/10W	
	R3403	1-216-821-11	METAL CHIP	1K	5%	1/10W	R5223	1-208-814-91	METAL CHIP	22K	0.5%	•	
	R3500	1-216-834-11	METAL CHIP	12K	5%	1/10W	R5225	1-216-057-00	RES-CHIP	2.2K	5%	1/10W	
	R3501	1-216-834-11	METAL CHIP	12K	5%	1/10W	R5226	1-212-849-00	FUSIBLE	4.7	5%	1/4W	
	R3504	1-216-825-11	METAL CHIP	2.2K	5%	1/10W	R5227	1-216-049-11	RES-CHIP	1K	5%	1/10W	
	R3505	1-216-825-11	METAL CHIP	2.2K	5%	1/10W	R5228	1-216-049-11	RES-CHIP	1K	5%	1/10W	
	R3603	1-216-295-91	SHORT CHIP	0			R5229	1-216-837-11	METAL CHIP	22K	5%	1/10W	
	R5118	1-249-413-11	CARBON	470	5%	1/4W	R5230	1-218-873-11	METAL CHIP	12K	0.5%	1/10W	
	R5119	1-216-840-11	METAL CHIP	39K	5%	1/10W	R5231	1-216-057-00	RES-CHIP	2.2K	5%	1/10W	
	R5122	1-216-821-11	METAL CHIP	1K	5%	1/10W	R5232	1-216-845-11	METAL CHIP	100K	5%	1/10W	
	R5125	1-216-836-11	METAL CHIP	18K	5%	1/10W	R5233	1-216-057-00	RES-CHIP	2.2K	5%	1/10W	
	R5126	1-249-413-11	CARBON	470	5%	1/4W	R5234	1-216-833-11	METAL CHIP	10K	5%	1/10W	
	R5128	1-216-809-11	METAL CHIP	100	5%	1/10W	R5235	1-216-833-11	METAL CHIP	10K	5%	1/10W	
	R5129	1-216-809-11	METAL CHIP	100	5%	1/10W	R5237	1-216-049-11	RES-CHIP	1K	5%	1/10W	
	R5130	1-216-809-11	METAL CHIP	100	5%	1/10W	R5238	1-216-393-00	METAL OXIDE	2.2	5%	3W	
	R5131	1-216-821-11	METAL CHIP	1K	5%	1/10W	R5239	1-208-848-11	METAL CHIP	560K		1/10W	
	<b>5</b> 7120	1-216-809-11	METAL CHIP	100	5%	1/10W	R5241	1-216-841-11	METAL CHIP	47K	5%	1/10W	
	R5132		METAL CHIP	100	5%	1/10W	R5300	1-208-806-11	METAL CHIP	10K		1/10W	
	R5133	1-216-809-11	METAL CHIP	100	ეა 5%	1/10W			METAL CHIP	4.7K		1/10W	
	R5137	1-216-809-11			5%		R5301	1-216-829-11				1/10W	
	R5138 R5139	1-216-809-11 1-216-821-11	METAL CHIP METAL CHIP	100 1K	5%	1/10W 1/10W	R5302 R5303	1-208-806-11 1-216-685-11	METAL CHIP METAL CHIP	10K 27K		1/10W	
	10107	1 110 011							<b></b>				
	R5140	1-216-821-11	METAL CHIP	1K	5%	1/10W	R5304	1-208-806-11	METAL CHIP	10K		1/10W	
	R5141	1-216-833-11	METAL CHIP	10K	5%	1/10W	R5305	1-208-852-11	METAL CHIP	820K	0.5%	1/10W	
	R5143	1-216-833-11	METAL CHIP	10K	5%	1/10W	R5306	1-208-803-11	METAL CHIP	7.5K	0.5%	1/10W	
	R5144	1-216-821-11	METAL CHIP	1K	5%	1/10W	R5307	1-216-041-00	RES-CHIP	470	5%	1/10W	
	R5145	1-216-809-11	METAL CHIP	100	5%	1/10W	R5308	1-216-295-91	SHORT CHIP	0			
	R5147	1-216-809-11	METAL CHIP	100	5%	1/10W	R5309	1-208-824-11	METAL CHIP	56K	0.5%	1/10W	
	R5150	1-249-414-11	CARBON	560	5%	1/4W	R5310	1-208-830-11	METAL CHIP	100K		1/10W	
	R5151	1-249-454-11	CARBON	3.9	5%	1/4W	R5311	1-216-045-00	RES-CHIP	680	5%	1/10W	
	R5151	1-249-413-11	CARBON	470	5%	1/4W	R5312	1-208-832-11	METAL CHIP	120K		1/10W	
	R5152	1-249-393-11	CARBON	10	5%	1/4W	R5314	1-208-840-11	METAL CHIP	270K		1/10W	
	DE1 E 4	1-216-833-11	METAL CHIP	10K	5%	1/10W	R5315	1-216-043-91	RES-CHIP	560	5%	1/10W	
	R5154			2.2K	5%	1/10W 1/4W	ŧ			2.2K		1/10W	
	R5155	1-249-421-11	CARBON CUTD		5% 5%		R5316	1-216-057-00	RES-CHIP	2.2K 100K	5% 5%	1/10W	
	R5156	1-216-833-11	METAL CHIP	10K	5% 5%	1/10W	R5317	1-216-845-11	METAL CHIP	100K		1/10W 1/10W	
	R5157	1-216-829-11	METAL CHIP RES-CHIP	4.7K 3.3K		1/10W 1/10W	R5318 R5319	1-208-806-11 1-208-840-11	METAL CHIP METAL CHIP	10K 270K		1/10W 1/10W	
	R5201	1-216-061-91											

REF.NO.	PART.NO	DESCRIPTION		RE	MARK	REF.NO.	PART.NO	DESCRIPTION		RE	MARK
R5320	1-216-833-11	METAL CHIP	10K	5%	1/10W	R5871	1-216-850-11	METAL CHIP	270K	5%	1/10W
R5321	1-216-837-11	METAL CHIP	22K	5%	1/10W	R5872	1-216-073-91	RES-CHIP	10K	5%	1/10W
R5322	1-216-820-11	METAL CHIP	820	5%	1/10W	R5873	1-216-073-91	RES-CHIP	10K	5%	1/10W
R5324	1-208-810-11	METAL CHIP	15K		1/10W	R5875	1-216-825-11	METAL CHIP	2.2K	5%	1/10W
R5325	1-208-812-11	METAL CHIP	18K		1/10W	R5877	1-216-829-11	METAL CHIP	4.7K	5%	1/10W
R3323	1-200-012-11	METAL CHIL	2020	V.50	-/						-•
R5326	1-216-845-11	METAL CHIP	100K	5%	1/10W	R5878	1-216-817-11	METAL CHIP	470	5%	1/10W
R5327	1-216-472-00	METAL OXIDE	39	5%	3W	R5879	1-216-809-11	METAL CHIP	100	5%	1/10W
R5328	1-216-033-00	RES-CHIP	220	5%	1/10W	R5880	1-216-809-11	METAL CHIP	100	5%	1/10W
R5331	1-216-033-00	RES-CHIP	220	5%	1/10W	R5881	1-216-833-11	METAL CHIP	10K	5%	1/10W
R5332	1-208-806-11	METAL CHIP	10K	0.5%	1/10W	R5882	1-216-833-11	METAL CHIP	10K	5%	1/10W
					4 /4 /	25000	1 01/ 057 11	MMM17 AUTD	11/	5%	1/10W
R5333	1-208-820-11	METAL CHIP	39K		1/10W	R5883	1-216-857-11	METAL CHIP	1M		-
R5334	1-208-834-11	METAL CHIP	150K		1/10W	R5884	1-216-841-11	METAL CHIP	47K	5% =°	1/10W
R5335	1-208-818-11	METAL CHIP	33K		1/10W	R5885	1-216-809-11	METAL CHIP	100	5%	1/10W
R5336	1-216-057-00	RES-CHIP	2.2K	• •	1/10W	R5887	1-216-809-11	METAL CHIP	100	5%	1/10W
R5337	1-218-867-11	METAL CHIP	6.8K	0.5%	1/10W	R5888	1-216-809-11	METAL CHIP	100	5%	1/10W
R5338	1-249-413-11	CARBON	470	5%	1/4W	R5889	1-208-806-11	METAL CHIP	10K	0.5%	1/10W
R5340	1-216-057-00	RES-CHIP	2.2K	5%	1/10W	R5892	1-216-833-11	METAL CHIP	10K	5%	1/10W
R5341	1-216-089-91	RES-CHIP	47K	5%	1/10W	R5895	1-216-833-11	METAL CHIP	10K	5%	1/10W
R5342	1-208-818-11	METAL CHIP	33K	0.5%	1/10W	R5898	1-216-832-11	METAL CHIP	8.2K	5%	1/10W
R5343	1-208-808-11	METAL CHIP	12K	0.5%	1/10W	R5899	1-216-863-11	METAL CHIP	3.3M	5%	1/10W
	• • • • • • • • • • • • • • • • • • • •										4 /4 4
R5344	1-208-820-11	METAL CHIP	39K	0.5%	•	R6200	1-218-831-11	METAL CHIP	220	0.5%	1/10W
R5345	1-208-832-11	METAL CHIP	120K	0.5%		R6201	1-218-839-11	METAL CHIP	470	0.5%	1/10W
R5346	1-216-849-11	METAL CHIP	220K	5%	1/10W	R6202	1-249-395-11	CARBON	15	5%	1/4W
R5400	1-216-849-11	METAL CHIP	220K	5%	1/10W	R7007	1-216-049-11	RES-CHIP	1K	5%	1/10W
R5401	1-216-837-11	METAL CHIP	22K	5%	1/10W	R7018	1-216-025-11	RES-CHIP	100	5%	1/10W
R5402	1-216-081-00	RES-CHIP	22K	5%	1/10W	R7023	1-216-834-11	METAL CHIP	12K	5%	1/10W
R5403	1-216-829-11	METAL CHIP	4.7K	5%	1/10W	R7034	1-216-025-11	RES-CHIP	100	5%	1/10W
R5404	1-216-829-11	METAL CHIP	4.7K	5%	1/10W	R7035	1-216-025-11	RES-CHIP	100	5%	1/10W
R5405	1-216-829-11	METAL CHIP	4.7K	5%	1/10W	R7048	1-216-025-11	RES-CHIP	100	5%	1/10W
R5407	1-216-857-11	METAL CHIP	1M	5%	1/10W	R7050	1-216-833-11	METAL CHIP	10K	5%	1/10W
	1 01 0 005 11	METAL CHIP	2.2K	EQ.	1/10W	R7051	1-216-025-11	RES-CHIP	100	5%	1/10W
R5408	1-216-825-11					R7051	1-216-025-11	RES-CHIP	100	5%	1/10W
R5409	1-208-802-11	METAL CHIP			1/10W	i			100 1K	5%	1/10W
R5410	1-208-798-11	METAL CHIP			1/10W	R7053	1-216-049-11	RES-CHIP	150K		1/10W
R5411	1-216-061-91	RES-CHIP	3.3K		1/10W	R7054	1-216-847-11	METAL CHIP			1/10W
R5413	1-208-802-11	METAL CHIP	6.8K	0.5%	1/10W	R7056	1-218-867-11	METAL CHIP	18.0	0.5%	1/10#
R5414	1-249-383-11	CARBON	1.5	5%	1/4W	R7057	1-216-842-11	METAL CHIP	56K	5%	1/10W
R5415	1-249-389-11	CARBON	4.7	5%	1/4W	R7058	1-216-049-11	RES-CHIP	1K	5%	1/10W
R5416	1-215-888-00	METAL OXIDE	220	5%	2W	R7065	1-216-821-11	METAL CHIP	1K	5%	1/10W
R5417	1-208-798-11	METAL CHIP			1/10W	R7066	1-216-809-11	METAL CHIP	100	5%	1/10W
R5420	1-214-798-21	METAL	1.8	1%	1/2W	R7067	1-216-295-91	SHORT CHIP	0		
13420	1 214 100 21										
R5421	1-214-798-21	METAL	1.8	1%	1/2W	R7068	1-218-877-11	METAL CHIP	18K		1/10W
R5803	1-216-861-11	METAL CHIP	2.2M	5%	1/10W	R7070	1-216-817-11	METAL CHIP	470	5%	1/10W
R5804	1-216-049-11	RES-CHIP	1K	5%	1/10W	R7071	1-216-817-11	METAL CHIP	470	5%	1/10W
R5805	1-216-049-11	RES-CHIP	1K	5%	1/10W	R7072	1-216-817-11	METAL CHIP	470	5%	1/10W
R5806	1-216-089-91	RES-CHIP	47K	5%	1/10W	R7073	1-216-041-00	RES-CHIP	470	5%	1/10W
R5807	1-216-049-11	RES-CHIP	1K	5%	1/10W	R7074	1-216-043-91	RES-CHIP	560	5%	1/10W
R5808	1-216-049-11	RES-CHIP	1K	5%	1/10W	R7075	1-216-817-11	METAL CHIP	470	5%	1/10W
R5809	1-216-073-91	RES-CHIP	10K	5%	1/10W	R7076	1-216-041-00	RES-CHIP	470	5%	1/10W
R5865	1-216-841-11	METAL CHIP	47K	5%	1/10W	R7077	1-216-043-91	RES-CHIP	560	5%	1/10W
R5869	1-216-841-11	METAL CHIP	470	5%	1/10W	R7078	1-216-817-11	METAL CHIP	470	5%	1/10W
KOOCA	T-710-01/-TI	raini Cill	310		-/ -VII	1 3	=				

1-216-041-00 1-216-043-91 1-216-817-11 1-208-782-11 1-216-833-11 1-208-783-11 1-216-819-11 1-216-819-11 1-216-803-11 1-216-803-11	RES-CHIP METAL CHIP METAL CHIP METAL CHIP METAL CHIP METAL CHIP METAL CHIP	560 5 470 5 1K 0 10K 5	5% 1/1 5% 1/1 5% 1/1 0.5% 1/1 5% 1/1	OW OW	CN0001	< CONNI * 1-793-497-11	ECTOR >  CONNECTOR,	BOARD TO BOARD	40P
1-216-817-11 1-208-782-11 1-216-833-11 1-208-783-11 1-216-819-11 1-216-819-11 1-216-819-11 1-216-803-11	METAL CHIP METAL CHIP METAL CHIP METAL CHIP METAL CHIP METAL CHIP	470 5 1K 0 10K 5	5% 1/1 ).5% 1/1	OW Ow	CN0001	* 1-793-497-11	CONNECTOR,	BOARD TO BOARD	40P
1-208-782-11 1-216-833-11 1-208-783-11 1-216-819-11 1-216-819-11 1-216-819-11 1-216-803-11	METAL CHIP METAL CHIP METAL CHIP METAL CHIP METAL CHIP	1K 0	).5% 1/1	0W	CN0001	* 1-793-497-11	CONNECTOR,	BOARD TO BOARD	40P
1-216-833-11 1-208-783-11 1-216-819-11 1-216-819-11 1-216-819-11 1-216-803-11	METAL CHIP METAL CHIP METAL CHIP	10K 5							
1-208-783-11 1-216-819-11 1-216-819-11 1-216-819-11 1-216-803-11	METAL CHIP METAL CHIP METAL CHIP		5% 1/1	OW					
1-216-819-11 1-216-819-11 1-216-819-11 1-216-803-11	METAL CHIP METAL CHIP	1.1K (		V.I.	1	< DIOD	E >		
1-216-819-11 1-216-819-11 1-216-819-11 1-216-803-11	METAL CHIP METAL CHIP	1.1K (							
1-216-819-11 1-216-819-11 1-216-803-11	METAL CHIP		).5% 1/1		D0001	6-500-079-01	DIODE BAS4		
1-216-819-11 1-216-803-11			5% 1/1		D0301	8-719-069-56	DIODE UDZS	TE-176.2B	
1-216-803-11	MOMENT OFFT		5% 1/1						
	METAL CHIP		5% 1/1			< FERR	ITE BEAD >		
1 016 000-11	METAL CHIP	33 5	5% 1/1	OW		1 01 0 00 01			
1 016 002_11					FB0003	1-216-295-91	SHORT CHIP		
			5% 1/1		FB0004	1-412-006-31	INDUCTOR	10UH	
1-216-803-11	METAL CHIP	33	5% 1/1	OW	FB0005	1-216-864-11	SHORT CHIP		
					FB0006	1-216-864-11	SHORT CHIP		
< RESI	STOR VARIABLE >				FB0007	1-412-006-31	INDUCTOR	100H	
1-238-600-11	RES. ADJ. CARE	BON 10K			FB0008	1-216-295-91	SHORT CHIP	0	
1 200 000 11					FB0009	1-412-006-31	INDUCTOR	10UH	
1-795-617-11	SAW FILTER				FB0010	1-216-295-91	SHORT CHIP		
1 100 011 44					1	1-412-006-31	INDUCTOR	10UH	
< TUNE	R >				FB0012	1-216-295-91			
8-598-623-10	TUNER, FSS BTI	P-AC421			1				
					1				
< CRYS	TAL >								
					l l				
1-767-704-11	•				FB0019	1-216-295-91	SHORT CHIP	0	
	•								
	•				FB0020	1-216-295-91	SHORT CHIP	0	
1-767-127-11	VIBRATOR, CER	AMIC				/ TO \			
4-062-A M Bo	ard Complete					<b>\10</b> /			
	•				IC0001	8-759-699-33	IC M24C16-	MN6T (A)	
< CAPA	CITOR >				IC0002	6-700-503-03	IC SAA5665	HL/M1/1402	
					IC0003	8-759-672-39	IC PST573I	MT	
1-107-826-11					IC0004	8-759-665-11	IC LM393DT		
1-107-826-11	CERAMIC CHIP (	).1UF	10.0		IC0005	6-702-395-01	IC K6F2008	V2E-YF70T	
1-164-360-11	CERAMIC CHIP (	).1UF		16V					
1-126-923-91	ELECT 2	220UF	20.0	0% 10V		< TRAN	SISTOR >		
1-107-826-11	CERAMIC CHIP (	).1UF	10.0	0% 16V	<b>.</b>				
					Q0002	8-729-424-08			
1-107-826-11			10.0			8-729-424-08			
1-165-128-11					Q0006	8-729-010-29			
1-162-927-11			5.00		Q0007	8-729-027-44			
1-165-128-11				16V	Q0008	8-729-027-44	TRANSISTOR	DTC114TKA-T146	
1-162-924-11	CERAMIC CHIP 5	56PF	5.00	% 50V		A WAA ACT			
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1-162-924-11			5.00		Q0013	8-729-421-22	TRANSISTOR	UN2211	
1-165-128-11	CERAMIC CHIP (	.22UF		16V		, water	CIMOD >		
1-162-962-11	CERAMIC CHIP A	170PF	10.0	0% 50V		< RESIS	STUK >		
					R0001	1-216-045-00	RES-CHTP	680 5%	1/10W
1-162-962-11					R0001	1-216-055-00	RES-CHIP	1.8K 5%	1/10W
1-126-947-11		170F		0% 35V	R0002	1-216-295-91	SHORT CHIP	0	-/
			-∨.∨		1 (40) (1)	T CTO CJJ_JT	OHOM CUTL	٧	
	1-238-600-11  1-795-617-11  < TUNE  8-598-623-10  < CRYS  1-767-704-11 1-760-628-11 1-781-946-21 1-767-127-11  4-062-A M Bo  < CAPA  1-107-826-11 1-107-826-11 1-164-360-11 1-126-923-91 1-107-826-11 1-165-128-11	1-795-617-11 SAW FILTER  < TUNER >  8-598-623-10 TUNER, FSS BTS  < CRYSTAL >  1-767-704-11 VIBRATOR, CRYSTAL >  1-760-628-11 VIBRATOR, CRYSTAL >  1-781-946-21 VIBRATOR, CRYSTAL >  4-062-A M Board Complete  < CAPACITOR >  1-107-826-11 CERAMIC CHIP (CAPACITOR)  1-165-128-11 CERAMIC CHIP (CAPACITOR)	1-238-600-11 RES, ADJ, CARBON 10K  1-795-617-11 SAW FILTER  < TUNER >  8-598-623-10 TUNER, FSS BTP-AC421  < CRYSTAL >  1-767-704-11 VIBRATOR, CRYSTAL 1-760-628-11 VIBRATOR, CRYSTAL 1-781-946-21 VIBRATOR, CRYSTAL 1-767-127-11 VIBRATOR, CERAMIC  4-062-A M Board Complete  < CAPACITOR >  1-107-826-11 CERAMIC CHIP 0.1UF 1-107-826-11 CERAMIC CHIP 0.1UF 1-164-360-11 CERAMIC CHIP 0.1UF 1-164-923-91 ELECT 220UF 1-107-826-11 CERAMIC CHIP 0.1UF 1-165-128-11 CERAMIC CHIP 0.1UF 1-165-128-11 CERAMIC CHIP 0.22UF 1-162-924-11 CERAMIC CHIP 0.22UF 1-165-128-11 CERAMIC CHIP 56PF  1-165-128-11 CERAMIC CHIP 56PF  1-165-128-11 CERAMIC CHIP 0.22UF 1-165-128-11 CERAMIC CHIP 0.22UF 1-165-128-11 CERAMIC CHIP 56PF  1-165-128-11 CERAMIC CHIP 0.22UF 1-165-128-11 CERAMIC CHIP 0.22UF 1-165-128-11 CERAMIC CHIP 56PF  1-165-128-11 CERAMIC CHIP 56PF 1-165-128-11 CERAMIC CHIP 0.22UF 1-162-962-11 CERAMIC CHIP 470PF 1-162-962-11 CERAMIC CHIP 470PF	1-238-600-11 RES, ADJ, CARBON 10K  1-795-617-11 SAW FILTER  < TUNER >  8-598-623-10 TUNER, FSS BTP-AC421  < CRYSTAL >  1-767-704-11 VIBRATOR, CRYSTAL 1-760-628-11 VIBRATOR, CRYSTAL 1-781-946-21 VIBRATOR, CRYSTAL 1-767-127-11 VIBRATOR, CRYSTAL 1-767-127-11 VIBRATOR, CRYSTAL 1-767-127-11 VIBRATOR, CRYSTAL 1-107-826-11 CERAMIC CHIP 0.1UF 10.0 1-107-826-11 CERAMIC CHIP 0.1UF 10.0 1-164-360-11 CERAMIC CHIP 0.1UF 10.0 1-164-360-11 CERAMIC CHIP 0.1UF 10.0 1-107-826-11 CERAMIC CHIP 0.1UF 10.0 1-107-826-11 CERAMIC CHIP 0.1UF 5.00 1-165-128-11 CERAMIC CHIP 0.2UF 1-162-927-11 CERAMIC CHIP 100PF 5.00 1-165-128-11 CERAMIC CHIP 0.22UF 1-162-924-11 CERAMIC CHIP 56PF 5.00 1-165-128-11 CERAMIC CHIP 56PF 5.00	1-238-600-11 RES, ADJ, CARBON 10K  1-795-617-11 SAW FILTER  < TUNER >  8-598-623-10 TUNER, FSS BTP-AC421  < CRYSTAL >  1-767-704-11 VIBRATOR, CRYSTAL 1-760-628-11 VIBRATOR, CRYSTAL 1-781-946-21 VIBRATOR, CRYSTAL 1-767-127-11 VIBRATOR, CRYSTAL 1-767-127-11 VIBRATOR, CRYSTAL 1-767-127-11 VIBRATOR, CRYSTAL 1-107-826-11 CERAMIC CHIP 0.1UF 10.00% 16V 1-107-826-11 CERAMIC CHIP 0.1UF 10.00% 16V 1-164-360-11 CERAMIC CHIP 0.1UF 10.00% 16V 1-126-923-91 ELECT 220UF 20.00% 10V 1-107-826-11 CERAMIC CHIP 0.1UF 10.00% 16V 1-107-826-11 CERAMIC CHIP 0.1UF 10.00% 16V 1-107-826-11 CERAMIC CHIP 0.2UF 16V 1-165-128-11 CERAMIC CHIP 0.2UF 16V 1-165-128-11 CERAMIC CHIP 0.2UF 16V 1-165-128-11 CERAMIC CHIP 56PF 5.00% 50V 1-165-128-11 CERAMIC CHIP 56PF 5.00% 50V 1-165-128-11 CERAMIC CHIP 0.2UF 16V 1-135-834-91 CERAMIC CHIP 0.2UF 6.3V 1-165-128-11 CERAMIC CHIP 0.2UF 16V	1-238-600-11 RES, ADJ, CARBON 10K FB0009 1-795-617-11 SAW FILTER FB0010	1-238-600-11 RES, ADJ, CARBON 10K  1-795-617-11 SAN FILTER  FB0009 1-412-006-31 FB0009 1-412-006-31 FB0010 1-216-295-91 FB0010 1-216-295-91 FB0011 1-412-006-31 FB0011 1-412-006-31 FB0011 1-412-006-31 FB0012 1-216-295-91 FB0012 1-216-295-91 FB0012 1-216-295-91 FB0012 1-216-295-91 FB0012 1-216-295-91 FB0012 1-216-295-91 FB0013 1-216-295-91 FB0018	1-238-600-11 RES, ADJ, CARBON 10K  1-795-617-11 SAN FILTER  CTUNER >  8-598-623-10 TUNER, FSS BTP-AC421  CCRYSTAL >  FB0012 1-216-295-91 SHORT CHIP FB0010 1-216-864-11 SHORT CHIP FB0016 1-216-864-11 SHORT CHIP FB0016 1-216-864-11 SHORT CHIP FB0016 1-216-864-11 SHORT CHIP FB0017 1-216-295-91 SHORT CHIP FB0018 1-216-295-91 SHORT CHIP FB0018 1-216-295-91 SHORT CHIP FB0018 1-216-295-91 SHORT CHIP FB0018 1-216-295-91 SHORT CHIP 1-767-127-11 VIBRATOR, CRISTAL FB0019 1-216-295-91 SHORT CHIP 1-767-127-11 VIBRATOR, CRISTAL FB0019 1-216-295-91 SHORT CHIP 1-767-127-11 VIBRATOR, CRISTAL FB0019 1-216-295-91 SHORT CHIP 1-767-262-11 CRRAMIC CHIP 0.1UF 10.00% 16V IC0002 6-700-503-30 IC SAA5665 IC0003 8-759-672-39 IC PSTST31 IC MASS 1-106-280-11 CRRAMIC CHIP 0.1UF 10.00% 16V IC0004 8-759-665-11 IC LM993DT 1-107-826-11 CRRAMIC CHIP 0.1UF 10.00% 16V IC0005 6-702-395-01 IC REF2008 IC-126-292-91 ELECT 220UF 20.00% 10V CRRAMIC CHIP 0.1UF 10.00% 16V IC0005 8-729-010-29 TRANSISTOR 1-165-128-11 CRRAMIC CHIP 0.2UF 16V Q0006 8-729-010-29 TRANSISTOR 1-165-128-11 CRRAMIC CHIP 0.2UF 16V Q0008 8-729-027-44 TRANSISTOR 1-165-128-11 CRRAMIC CHIP 0.2UF 16V Q0008 8-729-027-44 TRANSISTOR IC-165-128-11 CRRAMIC CHIP 0.2UF 16V Q0008 8-729-027-44 TRANSISTOR 1-165-128-11 CRRAMIC CHIP 0.2UF 16V Q0008 8-729-027-44 TRANSISTOR 1-165-128-11 CRRAMIC CHIP 0.2UF 16V Q0010 8-729-027-44 TRANS	1-238-600-11 RES, ADJ, CARBON 10K  1-795-617-11 SAW FILTER  CTUNER >  8-598-623-10 TUNER, FSS BTF-AC421  CCRYSTAL    1-767-704-11 VIBRATOR, CRYSTAL    1-760-628-11 VIBRATOR, CRYSTAL    1-760-628-11 VIBRATOR, CRYSTAL    1-760-628-11 VIBRATOR, CRYSTAL    1-761-127-11 VIBRATOR, CRYSTAL    1-761-127-11 VIBRATOR, CRYSTAL    1-107-826-11 CERAMIC CRIP 0.1UF 10.00% 16V    1-107-826-11 CERAMIC CRIP 0.2UF 16V    1-162-927-11 CERAMIC CRIP 0.2UF 16V    1-162-924-11 C

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REF.NO.	PART.NO	DESCRIPTION		RI	EMARK	REF.NO.	PART.NO	DESCRIPTION		R	EMARK	
R0014	1-216-081-00	RES-CHIP	22K	5%	1/10W	R0073	1-216-809-11	METAL CHIP	100	5%	1/10W	
R0014	1-216-025-11	RES-CHIP	100	5%	1/10W	R0074	1-216-809-11	METAL CHIP	100	5%	1/10W	
R0017	1-216-093-91	RES-CHIP	68K	5%	1/10W	R0075	1-216-025-11	RES-CHIP	100	5%	1/10W	
R0017	1-216-025-11	RES-CHIP	100	5%	1/10W	R0076	1-216-049-11	RES-CHIP	1K	5%	1/10W	
R0019	1-216-073-91	RES-CHIP	10K	5%	1/10W	R0078	1-216-817-11	METAL CHIP	470	5%	1/10W	
	2 220 0.00											
R0020	1-216-049-11	RES-CHIP	1K	5%	1/10W	R0079	1-216-065-91	RES-CHIP	4.7K		1/10W	
R0022	1-216-809-11	METAL CHIP	100	5%	1/10W	R0301	1-216-073-91	RES-CHIP	10K	5%	1/10W	
R0023	1-216-097-11	RES-CHIP	100K	5%	1/10W	R0302	1-216-073-91	RES-CHIP	10K	5%	1/10W	
R0027	1-216-821-11	METAL CHIP	1K	5%	1/10W	R0303	1-216-836-11	METAL CHIP	18K	5%	1/10W	ī
R0028	1-216-833-11	METAL CHIP	10K	5%	1/10W	R0304	1-218-867-11	METAL CHIP	6.8K	0.5%	1/10W	
R0029	1-216-025-11	RES-CHIP	100	5%	1/10W		< CRY	STAL >				
R0030	1-216-025-11	RES-CHIP	100	5%	1/10W							
R0032	1-216-809-11	METAL CHIP	100	5%	1/10W	X0001	1-578-774-11	VIBRATOR, CE	RYSTAL			
R0033	1-216-809-11	METAL CHIP	100	5%	1/10W			,				
R0034	1-218-725-11	METAL CHIP	24K		1/10W	* A-16	37-024-A G Bo	oard Complete	;			
					4.14.000		+ 3.1627_0243	COMPLETE PC	מפגספ	c		
R0035	1-216-069-00	RES-CHIP	6.8K		1/10W		* A-1637-024-A	COMPLETE PC	PAULT !	J		
R0037	1-216-061-91	RES-CHIP			1/10W		4 202 054 01	CODER (MOVO)	. יום	1 /11		
R0039	1-216-809-11	METAL CHIP	100	5%	1/10W		4-382-854-01	SCREW (M3X8)	, F, SF	(+)		
R0040	1-216-809-11	METAL CHIP	100	5%	1/10W							
R0041	1-216-057-00	RES-CHIP	2.2K	5%	1/10W		< CAP.	ACITOR >				
R0042	1-216-069-00	RES-CHIP	6.8K	5%	1/10W	C6001	A 1-165-528-11	MYLAR	0.1UF		10	275V
R0043	1-216-803-11	METAL CHIP	33	5%	1/10W	C6002	△ 1-165-528-11	MYLAR	0.1UF		10	275V
R0044	1-216-025-11	RES-CHIP	100	5%	1/10W	C6003	A 1-119-899-51	CERAMIC	1000PE		10.00%	250V
R0045	1-216-803-11	METAL CHIP	33	5%	1/10W	C6004	△ 1-119-899-51	CERAMIC	1000PE		10.00%	250V
R0046	1-216-803-11	METAL CHIP	33	5%	1/10W	C6005	1-126-965-91	ELECT	22UF		20.00%	50V
20047	1-216-810-11	METAL CHIP	120	5%	1/10W	C6006	1-117-753-11	ELECT (BLOCK)	470UF		20.00%	450V
R0047	1-216-809-11	METAL CHIP	100	5%	1/10W	C6007	1-126-964-11	ELECT	10UF		20.00%	50V
R0048	1-216-073-91	RES-CHIP	10K	5%	1/10W	C6008	1-126-963-11	ELECT	4.7UF		20.00%	50V
R0049	1-216-810-11	METAL CHIP	120	5%	1/10W	C6010	1-136-497-81	FILM	0.1UF		5.00%	50V
R0050	1-216-835-11	METAL CHIP	15K	5%	1/10W	C6011	1-162-964-11	CERAMIC CHI		F	10.00%	
R0051	1-210-055-11	METAN CHIL	1011	J.	1/ 1011							
R0052	1-216-810-11	METAL CHIP	120	5%	1/10W	******	A 1-104-571-91	CERAMIC	0.0015		10.00%	
R0053	1-216-809-11	METAL CHIP	100	5%	1/10W	200000000000000000000000000000000000000	<u>∧</u> 1-104-571-91	CERAMIC	0.0015	UF	10.00%	v.sec.ee.co.co.co.co.co.c
R0054	1-216-809-11	METAL CHIP	100	5%	1/10W	C6015	1-115-339-11	CERAMIC CHI			10.00%	
R0055	1-216-809-11	METAL CHIP	100	5%	1/10W		A 1-104-571-91	CERAMIC	0.0015		10.00%	
R0056	1-216-833-11	METAL CHIP	10K	5%	1/10W	C6017 .	A 1-104-571-91	CERAMIC	0.0015	UF	10.00%	2KV
R0057	1-216-809-11	METAL CHIP	100	5%	1/10W	C6018	1-126-949-11	ELECT	220UF		20.00%	35V
R0058	1-216-823-11	METAL CHIP			1/10W	C6020	1-135-946-22	FILM	47000E	F	3%	V008
R0059	1-216-841-11	METAL CHIP	47K	5%	1/10W	C6021	1-164-645-11	CERAMIC	1000PE	•	10.00%	500V
	1-216-833-11	METAL CHIP	10K	5%	1/10W	C6022	1-126-963-11	ELECT	4.7UF		20.00%	50V
R0060	1-216-833-11	METAL CHIP	10K	5%	1/10W	C6023	1-110-626-11	ELECT	330UF		20.00%	
R0061	1-210-055-11	MEIAH CHIF	1010	J 6	1/10#							n .
R0062	1-216-833-11	METAL CHIP	10K	5%	1/10W	C6024	1-164-625-11	CERAMIC	680PF		10.00%	
R0063	1-216-073-91	RES-CHIP	10K	5%	1/10W	C6025	1-164-625-11	CERAMIC	680PF		10.00%	
R0065	1-216-073-91	RES-CHIP	10K	5%	1/10W	C6026	1-164-625-11	CERAMIC	680PF		10.00%	
R0066	1-218-871-11	METAL CHIP	10K	0.5%	1/10W	C6027	1-164-625-11	CERAMIC	680PF		10.00%	
R0067	1-216-833-11	METAL CHIP	10K	5%	1/10W	C6028	1-128-548-11	ELECT	4700UE	1	20.00%	25V
R0068	1-216-833-11	METAL CHIP	10K	5%	1/10W	C6029	1-126-939-11	ELECT	100000	F	20.00%	16V
	1-216-633-11	RES-CHIP	10K	5%	1/10W	C6030	1-119-940-51	ELECT	4700UF		20.00%	
R0069	1-216-075-91	RES-CHIP	100	5% 5%	1/10W	C6031	1-535-143-71	LEAD, JUMPER	(7.5MM)			
R0070		METAL CHIP	100	აუ 5%	1/10W 1/10W		△ 1-113-927-11	CERAMIC	0.01UE			250V
R0071	1-216-809-11 1-216-809-11	METAL CHIP	100	5%	1/10W	C6033	1-162-964-11	CERAMIC CHIE	*************		10.00%	000000000000000000000000000000000000000
R0072	T-5T0-003-TT	WIND CUIL	100	• 0	=/ ==#	1	<del></del>					

Note: The components identified by shading and marked △ are critical for safety. Replace only with the part numbers specified in the parts list.

REF.NO.	PART.NO	DESCRIPTION	REMARK	REF.NO.	PART.NO	DESCRIPTION	REMARK
C6034	1-162-968-11	CERAMIC CHIP 0.0047UE	10.00% 50V	FB6005	1-535-303-00	LEAD, JUMPER	(5.0MM)
C6035	1-136-497-81	FILM 0.1UF	5.00% 50V	FB6006	1-535-303-00	LEAD, JUMPER	•
C6036	1-136-479-11	FILM 0.001UF	5.00% 100V			. ,	• ,
C6037	1-126-947-11	ELECT 47UF	20.00% 35V		< IC >		
C6038	1-164-645-11	CERAMIC 1000PF	10.00% 500V				
••••				IC6001	8-759-670-30	IC MCZ3001D	
C6039	1-125-891-11	CERAMIC CHIP 0.47UF	10.00% 10V	IC6003	8-749-016-19	IC SE135N-LF4	
C6040	1-115-340-11	CERAMIC CHIP 0.22UF	10.00% 25V				i e
C6045	1-115-339-11	CERAMIC CHIP 0.1UF	10.00% 50V		< COIL	>	
C6102	1-126-943-11	ELECT 2200UF	20.00% 25V				
C6103	1-126-971-11	ELECT 470UF	20.00% 50V	L6001	1-406-663-21	INDUCTOR	47UH
				L6002	1-412-529-11	INDUCTOR	22UH
C6105	1-126-964-11	ELECT 10UF	20.00% 50V	L6003	1-412-529-11	INDUCTOR	22UH
C6106	1-126-964-11	ELECT 10UF	20.00% 50V	L6004	1-535-303-00	LEAD, JUMPER	(5.0MM)
				L6005	1-535-303-00	LEAD, JUMPER	(5.0MM)
	< CON	NECTOR >					
				L6006	1-406-659-11	INDUCTOR	10UH
CN6001	∆ * 1-691-291-11	PIN, CONNECTOR (PC B	DARD) 5P	L6007	1-412-525-31	INDUCTOR	10UH
CN6002	A * 1-508-786-00	PIN, CONNECTOR (5MM:	PITCH) 2P				
CN6003	A * 1-508-765-00	PIN, CONNECTOR (5MM)	PITCH) 3P		< PHOT	OCOUPLER >	
	<b>△* 1-691-960-11</b>	PIN, CONNECTOR (PC B	DARD) 3P	1			
CN6005	* 1-564-509-11	PLUG, CONNECTOR 6P		PH6001	△ 8-749-016-21	IC TCET1103G	
CN6006	* 1-564-516-11	PLUG, CONNECTOR 13P			< TRAN	SISTOR >	
CN6008	1-816-981-71	PLUG, CONNECTOR 4P					
				Q6003	8-729-010-29	TRANSISTOR MS	
	< DIO	DE >		Q6005	8-729-029-56	TRANSISTOR D	
				Q6006	6-550-698-01		PA08N50C3-E8152
D6001	6-500-067-01	DIODE GSIB460L/45		Q6007	6-550-698-01		PA08N50C3-E8152
D6002	8-719-982-26	DIODE MTZJ-33B		Q6010	8-729-119-78	TRANSISTOR 25	SC2785-HFE
D6004	8-719-979-64	DIODE UF4005PKG23					
D6006	8-719-081-97	DIODE MMDL914T1		Q6101	8-729-029-56	TRANSISTOR D	
D6007	8-719-081-97	DIODE MMDL914T1		Q6102	8-729-010-29	TRANSISTOR M	
				Q6103	8-729-029-56	TRANSISTOR D	
D6008	8-719-063-70	DIODE D1NL20U		Q6104	8-729-010-29	TRANSISTOR M	
D6009	8-719-110-41	DIODE RD15ESB2		Q6105	8-729-010-29	TRANSISTOR M	SD601-RST1
D6010	8-719-085-24	DIODE FBIU4D7M1-B					
D6016	8-719-312-47	DIODE RBA-406B			< RESI	STOR >	
D6031	8-719-080-59	DIODE EK19-V0					
				JR6004	1-216-295-91	SHORT CHIP	0
D6032	8-719-080-59	DIODE EK19-V0					
D6033	8-719-022-97	DIODE D2S4MF		1	△ 1-202-933-61	FUSIBLE	0.1 10% 1/2W
D6034	8-719-022-97	DIODE D2S4MF			A 1-205-998-11	CEMENTED	1 5% 10W
D6035	1-535-303-00	LEAD, JUMPER (5.0MM)		77777	△ 1-205-998-11	CEMENTED	1 5% 10W
D6036	1-216-295-91	SHORT CHIP 0		R6006	△ 1-205-998-11	CEMENTED	1 5% 10W
				R6007	1-243-979-21	METAL OXIDE	0.1 5% 2W
D6101	8-719-081-97	DIODE MMDL914T1					A d BA A
D6102	8-719-511-40	DIODE S1VB40		R6008	1-243-979-21	METAL OXIDE	0.1 5% 2W
D6103	8-719-081-97	DIODE MMDL914T1		R6009	1-208-810-11	METAL CHIP	15K 0.5% 1/10W
D6104	8-719-081-97	DIODE MMDL914T1		R6010	1-215-481-00	METAL	330K 1% 1/4W
D6105	8-719-081-97	DIODE MMDL914T1			△ 1-218-265-11	METAL	8.2M 5% 1W
				R6014	1-215-926-00	METAL OXIDE	33K 5% 3W
D6106	8-719-081-97	DIODE MMDL914T1					A
D6107	8-719-081-97	DIODE MMDL914T1		R6015	1-208-757-11	METAL CHIP	91 0.5% 1/10W
				R6016	1-216-821-11	METAL CHIP	1K 5% 1/10W
	< FER	RITE BEAD >		R6017	1-216-833-11	METAL CHIP	10K 5% 1/10W
				R6018	1-260-131-11	CARBON	470K 5% 1/2W
FB6002	1-410-397-21	FERRITE 1.1UH		R6019	1-260-129-11	CARBON	330K 5% 1/2W
FB6003	1-410-397-21	FERRITE 1.1UH					

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REF.NO.	PART.NO	DESCRIPTION		R	EMARK	REF.NO.		DESCRIPTION		REMARK	
R6020	1-216-820-11	METAL CHIP	820	5%	1/10W	* A-164	10-432-A D Boa	rd Complete			
R6021	1-216-362-11	METAL OXIDE	0.27	5%	2W						
R6022	1-216-833-11	METAL CHIP	10K	5%	1/10W		4-382-854-01	SCREW (M3X8)	, P, SW (+)		
R6024	1-216-615-11	METAL CHIP	33	0.5%	1/10W						
R6029	1-216-833-11	METAL CHIP	10K	5%	1/10W		< CAPAC	ITOR >			
R6030	1-216-817-11	METAL CHIP	470	5%	1/10W	C8100	1-136-497-81	FILM	0.1UF	5.00%	50V
R6032	1-249-417-11	CARBON	1K	5%	1/4W	C8101	1-136-497-81	FILM	0.1UF	5.00%	50V
R6033	1-215-481-00	METAL	330K	1%	1/4W	C8102	1-136-497-81	FILM	0.1UF	5.00%	50V
R6034	1-249-389-11	CARBON	4.7	5%	1/4W	C8103	1-115-416-11	CERAMIC CHIP	0.001UF	5.00%	25V
R6035	1-260-083-11	CARBON	47	5%	1/2W	C8104	1-115-416-11	CERAMIC CHIP	0.001UF	5.00%	25V
R6036	1-216-817-11	METAL CHIP	470	5%	1/10W	C8105	1-126-947-11	ELECT	47UF	20.00%	35V
R6037	1-249-405-11	CARBON	100	5%	1/4W	C8106	1-164-315-11	CERAMIC CHIP	470PF	5.00%	50V
R6038	1-208-830-11	METAL CHIP	100K	0.5%	1/10W	C8107	1-208-820-11	METAL CHIP	39K	0.5%	1/10W
R6039	1-208-830-11	METAL CHIP	100K	0.5%	1/10W	C8108	1-162-970-11	CERAMIC CHIP	0.01UF	10.00%	25V
R6040	1-208-814-91	METAL CHIP	22K	0.5%		C8109	1-126-947-11	ELECT	47UF	20.00%	35V
	1 016 005 01	SHORT CHIP	0			C8113	1-162-970-11	CERAMIC CHIP	0.01UF	10.00%	25V
R6042	1-216-295-91 1-216-639-11	METAL CHIP	330	0.5%	1/10W	C8114	1-126-964-11	ELECT	10UF	20.00%	
R6045	1-216-639-11	METAL CHIP	330K	0.5%	•	C8115	1-162-962-11	CERAMIC CHIP		10.00%	
R6047	1-215-481-00	METAL	330K		1/4W	C8116	1-115-416-11	CERAMIC CHIP		5.00%	25V
R6048 R6049	1-213-461-00	METAL CHIP	9.1K	0.5%	•	C8117	1-115-416-11	CERAMIC CHIP	0.001UF	5.00%	25V
			100	A F0	1 /1 007	00110	1-162-970-11	CERAMIC CHIE	0.011112	10.00%	2517
R6050	1-208-758-11	METAL CHIP	100	0.5%	•	C8118	1-107-826-11	CERAMIC CHIP		10.00%	
R6054	1-216-615-11	METAL CHIP	33	0.5%	1/10W	C8119	1-165-176-11	CERAMIC CHIP		10.00%	
R6056	1-216-295-91	SHORT CHIP	0	A F0	1 /1 0**	C8120 C8125	1-163-176-11	CERAMIC CHIE		10.00%	
R6057 R6101	1-208-798-11 1-216-821-11	METAL CHIP METAL CHIP	4.7K 1K	0.5% 5%	1/10W 1/10W	C8125	1-165-176-11	CERAMIC CHIE		10.00%	
VOIAT	1 210 021 11										
R6102	1-216-829-11	METAL CHIP	4.7K		1/10W	C8128	1-162-968-11	CERAMIC CHIE		10.00%	
R6103	1-216-821-11	METAL CHIP	1K	5%	1/10W	C8130	1-164-230-11	CERAMIC CHIE		5.00% 20.00%	
R6104	1-216-821-11	METAL CHIP	1K	5%	1/10W	C8131	1-126-964-11	ELECT CERAMIC CHIE	10UF	5.00%	
R6105	1-216-821-11	METAL CHIP	1K	5% =^	1/10W	C8132	1-164-230-11	CERAMIC CHIE	220PF 2PF	0.25PF	
R6106	1-216-829-11	METAL CHIP	4.7K	5%	1/10W	C8134	1-102-935-00	CERAMIC	ZPE	V.2JFF	JV V
R6107	1-216-829-11	METAL CHIP	4.7K	5%	1/10W	C8135	1-126-964-11	ELECT	10UF	20.00%	
R6108	1-216-821-11	METAL CHIP	1K	5%	1/10W	C8136	1-126-964-11	ELECT	10UF	20.00%	
R6109	1-216-829-11	METAL CHIP	4.7K		1/10W	C8140	1-164-004-11	CERAMIC CHIE		10.00%	25V
R6110	1-216-821-11	METAL CHIP	1K	5%	1/10W	C8141	1-535-303-00 1-165-176-11	LEAD, JUMPER CERAMIC CHII		10.00%	. 16V
	< REL	AY >				C8207	1-165-176-11	CERMIC CHI	0.04/02	10.000	
						C8208	1-162-970-11	CERAMIC CHI	0.01UF	10.00%	
RY6001	△ 1-755-395-11	RELAY (AC PO	WER)			C8209	1-164-315-11	CERAMIC CHIE	470PF	5.00%	50V
RY6002		RELAY (AC PO				C8210	1-162-964-11	CERAMIC CHIL		10.00%	
				.,		C8801	1-126-947-11	ELECT	47UF	20.00%	
	< TRA	nsformer >				C8802	1-126-960-11	ELECT	1UF	20.00%	50V
#£AAA	△ 1-437-850-12	(PIT) CONVE	er tr	ansfor	MER	C8803	1-126-960-11	ELECT	1UF	20.00%	50V
	△ 1-424-896-11	TRANSFORMER				C8804	1-102-114-00	CERAMIC	470PF	10.00%	50V
	△ 1-424-030-11 △ 1-437-483-11	TRANSFORMER				C8805	1-102-114-00	CERAMIC	470PF	10.00%	
10101	1 101 110 11	-aumin's Variables		<del></del>		C8808	1-102-030-00	CERAMIC	330PF	10.00%	
	< THE	RMISTOR >				C8809	1-102-030-00	CERAMIC	330PF	10.00%	500V
							1 107 260 11	MYLAR	0.047UF	10.00%	200V
	. 1 004 /50 11	MUDDLETOMAN	DACTOR			1 CXXIII	1-10/-300-11		U. V4 / UE	10.000	
TH6002	△ 1-804-650-11	THERMISTOR,	POSITI	VE		C8810	1-107-368-11 1-107-368-11				
TH6002	A 1-804-650-11	THERMISTOR,	POSITI	VE		C8811	1-107-368-11	MYLAR	0.047UF	10.00%	200V
TH6002	A 1-804-650-11	THERMISTOR,	POSITI	VE		i					200V 2KV

REF.NO.	PART.NO	DESCRIPTION		REMARK		REF.NO.	PART.NO	DESCRIPTION	ON	REMAR
C8815	1-117-835-11	FILM	6200PF	3.00%	1.5KV	D8128	8-719-081-97	DIODE	MMDL914T1	
C8816	1-162-964-11	CERAMIC CHIP	0.001UF	10.00%	50V	D8129	8-719-081-97	DIODE	MMDL914T1	
C8817	1-125-893-11	FILM	680PF	3.00%	1.5KV	D8132	8-719-081-97	DIODE	MMDL914T1	
C8818	1-125-893-11	FILM	680PF	3.00%	1.5KV	D8133	8-719-081-97	DIODE	MMDL914T1	
C8819	1-125-893-11	FILM	680PF	3.00%	1.5KV	D8198	1-535-303-00	LEAD,	JUMPER (5.0MM)	
C8820	1-125-893-11	FILM	680PF	3.00%	1.5KV	D8199	8-719-081-97	DIODE	MMDL914T1	
C8824	1-107-846-11	FILM	0.1UF	5.00%	400V	D8611	8-719-081-97	DIODE	MMDL914T1	
C8825	1-117-663-11	FILM	0.22UF	5.00%	250V	D8612	8-719-081-97	DIODE	MMDL914T1	
C8826	1-115-518-11	FILM	0.47UF	5.00%	250V	D8803	8-719-908-03	DIODE	GP08D	
C8827	1-117-660-21	FILM	0.12UF			D8805	8-719-302-43	DIODE	EL1Z	
C8828	1-127-681-11	FILM	10000PF	2%	100V	D8806	8-719-979-85	DIODE	EGP20G	
C8829	1-127-680-11	FILM	4700PF	2%	100V	D8807	8-719-085-12	DIODE	BYV98-200-RAS 1	5/12
C8830	1-107-655-11	ELECT	47UF	20.00%		D8808	8-719-085-12		BYV98-200-RAS 1	
C8831	1-102-228-00	CERAMIC	470PF	10.00%		D8811	8-719-110-41		RD15ESB2	
C8832	1-126-941-11	ELECT	470UF	20.00%		D8818	8-719-109-89	DIODE	RD5.6ESB2	
00022	1-126-941-11	ELECT	470UF	20.00%	25∀	D8819	8-719-050-38	DIODE	M1MA152WK-T1	
C8833 C8834	1-126-941-11	CERAMIC	4700F	10.00%		D8820	8-719-081-97		MMDL914T1	
	1-102-228-00	CERAMIC	470PF	10.00%		D8851	8-719-970-87		ERA38-06	
C8835	1-102-228-00	ELECT	33UF	10.000	160V	D8856	8-719-081-97		MMDL914T1	
C8836 C8837	1-123-024-21	MYLAR	0.022UF	5.00%		D8857	8-719-110-41		RD15ESB2	
		OFFILITA OUT	A A 47mm	10 000	. 160	D8858	8-719-081-97	DIANE	MMDL914T1	
C8840	1-165-176-11	CERAMIC CHIP		10.00% 20.00%		D8860	8-719-110-41		RD15ESB2	
C8841	1-126-947-11	ELECT	47UF 0.18UF	5.00%		D0000	0-715-110-41	DIODE	10138002	
C8844	1-115-513-21	FILM CERAMIC	220PF	10.00%		<u> </u>	< FER	RITE BEAD >	•	
C8851	1-162-131-11	CERAMIC	150PF	10.00%				,		
C8852	1-162-129-00	CERMITC	LJVII	10.000	210	FB8806	1-410-397-21	FERRI?	re 1.1UH	
C8853	1-129-898-00	FILM	0.0022UF	5.00%	630V	FB8807	1-410-397-21	FERRI'		
C8855	1-136-205-11	MYLAR	0.022UF	5.00%						
C8856	1-102-030-00	CERAMIC	330PF	10.00%			< IC	>		
C8860	1-162-964-11	CERAMIC CHIE		10.00%						
C8861	1-162-927-11	CERAMIC CHIE		5.00%	50V	IC8100	8-759-659-67	IC LA	6393DLL	
00001	1 202 32	<b></b>				IC8101	8-759-659-67	IC LA	5393DLL	
C8869	1-162-964-11	CERAMIC CHIE	0.001UF	10.00%	50V	IC8102	8-759-638-79	IC NJ	43404AD-W	
60003						IC8103	8-759-659-67	IC LA	5393DLL	
	< CON	NECTOR >					< COI	L>		
CN8600	* 1-817-037-61	PLUG, CONNEC						· ·		
CN8601	* 1-816-980-71	PLUG, CONNEC				L8801	1-410-397-21	FERRI'		
CN8611	* 1-785-270-12	PIN, DY CONN		BOARD)		L8802	1-410-397-21	FERRI'		
CN8612	* 1-564-511-11	PLUG, CONNEC				L8803	1-410-397-21	FERRI'		
CN8614	* 1-564-508-11	PLUG, CONNEC	TOR 5P			L8805 L8851	1-408-947-00 1-535-303-00	INDUCT	FOR 2.2MH JUMPER (5.0MM)	
CN8616	1-695-915-11	TAB (CONTACT	!)						(	
CN8620	1-764-333-11	PIN, CONNECT	OR (PCB) (V	TYPE) 10P			< IND	UCTOR >		
CN8810	* 1-564-510-11	PLUG, CONNEC	CTOR 7P			LF8801	1-406-985-11	INDUC	FOR 2.2MH	
	< DIO	DE >				LF8851	1-406-674-11	INDUC		
D8102	8-719-081-97	DIODE MMDL91	.4T1				< TRA	NSISTOR >		
D8103	8-719-081-97	DIODE MMDL91								
D8103	8-719-081-97	DIODE MMDL91				Q8100	8-729-010-29	TRANSI	STOR MSD601-RST	1
D8105	8-719-081-97	DIODE MMDL91				Q8101	8-729-010-29	TRANS!	STOR MSD601-RST	1
						Q8102	8-729-010-29	TRANS]	STOR MSD601-RST	1
	8-719-081-97	DIODE MMDL91	.417							
D8107	8-719-081-97	DIONE WWDTAI	.411			Q8103	8-729-010-29		STOR MSD601-RST	1

REF.NO.	PART.NO	DESCRIPTION	REMARK	REF.NO.	PART.NO	DESCRIPTION		RE	MARK
Q8105	8-729-010-29	TRANSISTOR MSD601-R	ST1	R8113	1-216-833-11	METAL CHIP	10K	5%	1/10W
Q8106	8-729-010-29	TRANSISTOR MSD601-R	ST1	R8114	1-216-833-11	METAL CHIP	10K	5%	1/10W
Q8107	8-729-010-29	TRANSISTOR MSD601-R	ST1	R8115	1-216-845-11	METAL CHIP	100K	5%	1/10W
Q8108	8-729-010-05	TRANSISTOR MSB709-R	T1	R8116	1-216-845-11	METAL CHIP	100K	5%	1/10W
Q8110	8-729-010-05	TRANSISTOR MSB709-R	<b>T1</b>	R8117	1-216-833-11	METAL CHIP	10K	5%	1/10W
20220	• 120 121 13								
Q8112	8-729-010-29	TRANSISTOR MSD601-R	IST1	R8118	1-216-833-11	METAL CHIP	10K	5%	1/10W
Q8113	8-729-010-29	TRANSISTOR MSD601-R	ST1	R8119	1-216-833-11	METAL CHIP	10K	5%	1/10W
Q8115	8-729-010-05	TRANSISTOR MSB709-R	eT1	R8120	1-216-825-11	METAL CHIP	2.2K	5%	1/10W
Q8118	8-729-010-29	TRANSISTOR MSD601-R	ST1	R8121	1-216-825-11	METAL CHIP	2.2K	5%	1/10W
Q8119	8-729-010-05	TRANSISTOR MSB709-R	RT1	R8122	1-216-825-11	METAL CHIP	2.2K	5%	1/10W
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Q8120	8-729-010-05	TRANSISTOR MSB709-R	RT1	R8123	1-216-841-11	METAL CHIP	47K	5%	1/10W
Q8122	8-729-010-05	TRANSISTOR MSB709-F	RT1	R8124	1-216-821-11	METAL CHIP	1K	5%	1/10W
Q8123	8-729-010-05	TRANSISTOR MSB709-F	RT1	R8125	1-216-825-11	METAL CHIP	2.2K	5%	1/10W
Q8125	8-729-010-29	TRANSISTOR MSD601-F	RST1	R8126	1-216-815-11	METAL CHIP	330	5%	1/10W
Q8126	8-729-010-05	TRANSISTOR MSB709-F	RT1	R8127	1-208-794-11	METAL CHIP	3.3K	0.5%	1/10W
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Q8127	8-729-010-05	TRANSISTOR MSB709-F	RT1	R8128	1-208-822-11	METAL CHIP	47K		1/10W
Q8128	8-729-010-29	TRANSISTOR MSD601-F	RST1	R8129	1-208-822-11	METAL CHIP	47K		1/10W
Q8132	8-729-421-19	TRANSISTOR UN2213		R8130	1-208-846-11	METAL CHIP	470K	0.5%	1/10W
Q8135	8-729-010-29	TRANSISTOR MSD601-F	RST1	R8131	1-216-815-11	METAL CHIP	330	5%	1/10W
Q8136	8-729-010-05	TRANSISTOR MSB709-F	RT1	R8132	1-216-815-11	METAL CHIP	330	5%	1/10W
Q8137	8-729-010-29	TRANSISTOR MSD601-F	RST1	R8133	1-216-815-11	METAL CHIP	330	5%	1/10W
Q8201	8-729-010-29	TRANSISTOR MSD601-F	RST1	R8136	1-208-822-11	METAL CHIP	47K	0.5%	1/10W
Q8202	8-729-010-29	TRANSISTOR MSD601-F	RST1	R8137	1-208-822-11	METAL CHIP	47K		1/10W
Q8203	8-729-010-05	TRANSISTOR MSB709-F		R8138	1-208-822-11	METAL CHIP	47K		1/10W
Q8455	8-729-010-29	TRANSISTOR MSD601-F	RST1	R8139	1-208-822-11	METAL CHIP	47K	0.5%	1/10W
					1 01 0 00	10001	0.07	Fo	1 /1 003
Q8801	8-729-048-47	TRANSISTOR 2SC2688	• •	R8140	1-216-825-11	METAL CHIP	2.2K	5%	1/10W
Q8802	8-729-048-47	TRANSISTOR 2SC2688	• •	R8141	1-208-814-91	METAL CHIP	22K	0.5%	1/10W
Q8803	8-729-056-16	TRANSISTOR 2SC5698-		R8142	1-208-803-11	METAL CHIP		0.5% 5%	1/10W
Q8804	8-729-056-17	TRANSISTOR 2SC5696-		R8143	1-216-825-11	METAL CHIP METAL CHIP	2.2K	5% 5%	1/10W 1/10W
Q8805	8-729-050-48	TRANSISTOR IRF614-0	105	R8144	1-216-841-11	METAL CHIP	47K	34	I/IUW
00006	8-729-047-59	TRANSISTOR STP5NB40	ודס	R8145	1-216-825-11	METAL CHIP	2.2K	5%	1/10W
Q8806	8-729-421-19	TRANSISTOR UN2213	/EE	R8146	1-208-790-11	METAL CHIP	2.2K		1/10W
Q8807	8-729-010-29	TRANSISTOR MSD601-F	ንሮሞ1	R8149	1-216-828-11	METAL CHIP		5%	1/10W
Q8822 Q8823	8-729-424-08	TRANSISTOR UN2111		R8150	1-216-837-11	METAL CHIP	22K	5%	1/10W
Q8851	6-550-012-01	TRANSISTOR STP5NB40	) (033Y)	R8153	1-216-295-91	SHORT CHIP	0	••	_,
Ž002I	0-330-012-01	INTERPLETON DILLONDIN	, (0331)	1.0200			•		
	< RES	ISTOR >		R8154	1-208-782-11	METAL CHIP	1K	0.5%	1/10W
				R8155	1-208-789-11	METAL CHIP	2K		1/10W
R8100	1-216-813-11	METAL CHIP 220	5% 1/10W	R8158	1-208-794-11	METAL CHIP	3.3K		1/10W
R8101	1-216-813-11	METAL CHIP 220	5% 1/10W	R8159	1-216-295-91	SHORT CHIP	0		
R8102	1-216-825-11	METAL CHIP 2.2K		R8160	1-216-295-91	SHORT CHIP	0		
R8103	1-216-825-11	METAL CHIP 2.2K							
R8104	1-216-825-11	METAL CHIP 2.2K		R8161	1-208-804-11	METAL CHIP	8.2K	0.5%	1/10W
	2 224 323 22		,	R8162	1-216-821-11	METAL CHIP	1K	5%	1/10W
R8105	1-216-821-11	METAL CHIP 1K	5% 1/10W	R8163	1-216-833-11	METAL CHIP	10K	5%	1/10W
R8106	1-216-825-11	METAL CHIP 2.2K		R8164	1-208-814-91	METAL CHIP	22K	0.5%	1/10W
R8107	1-208-792-11		0.5% 1/10W	R8165	1-208-830-11	METAL CHIP	100K	0.5%	1/10W
R8108	1-208-792-11		0.5% 1/10W						
R8109	1-208-814-91	METAL CHIP 22K	0.5% 1/10W	R8168	1-216-829-11	METAL CHIP	4.7K	5%	1/10W
				R8169	1-208-830-11	METAL CHIP	100K	0.5%	1/10W
R8110	1-208-814-91	METAL CHIP 22K	0.5% 1/10W	R8170	1-216-815-11	METAL CHIP	330	5%	1/10W
R8111	1-216-825-11	METAL CHIP 2.2K	5% 1/10W	R8171	1-216-825-11	METAL CHIP	2.2K	5%	1/10W
R8112	1-216-825-11	METAL CHIP 2.2K		R8174	1-216-834-11	METAL CHIP	12K	5%	1/10W
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Note: The components identified by shading and marked △ are critical for safety. Replace only with the part numbers specified in the parts list.

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REF.NO.	PART.NO	DESCRIPTION		R	EMARK	REF.NO.	PART.NO	DESCRIPTION		RE	MARK
R8175	1-218-867-11	METAL CHIP	6.8K	0.5%	1/10W	R8817	1-216-361-00	METAL OXIDE	0.22	5%	2W
R8176	1-216-838-11	METAL CHIP	27K	5%	1/10W	R8818	1-249-405-11	CARBON	100	5%	1/4W
R8177	1-216-830-11	METAL CHIP	5.6K		1/10W	R8819	1-247-807-31	CARBON	100	5%	1/4W
R8179	1-216-295-91	SHORT CHIP	0	•	-,	R8831	1-260-124-11	CARBON		5%	1/2W
R8180	1-216-825-11	METAL CHIP	2.2K	5%	1/10W	R8833	1-202-972-61	FUSIBLE		5%	1/4W
R8181	1-216-295-91	SHORT CHIP	0			R8834	1-260-288-11	CARBON	0.47		1/2W
R8182	1-216-841-11	METAL CHIP	47K	5%	1/10W	R8835	1-260-288-11	CARBON		5%	1/2W
R8183	1-216-825-11	METAL CHIP	2.2K	5%	1/10W	R8836	1-249-432-11	CARBON		5%	1/4W
R8186	1-216-827-11	METAL CHIP	3.3K	5%	1/10W	R8837	1-215-894-11	METAL OXIDE	2.2K	5%	2W
R8188	1-216-829-11	METAL CHIP	4.7K	5%	1/10W	R8838	1-214-905-11	METAL	47K	1%	1/2W
R8189	1-216-822-11	METAL CHIP	1.2K	5%	1/10W	R8839	1-215-894-11	METAL OXIDE	2.2K	5%	2W
R8190	1-216-825-11	METAL CHIP	2.2K		1/10W	R8840	1-247-843-11	CARBON	3.3K	5%	1/4W
	1-215-925-11	METAL OXIDE	22K	5%	3W	R8842	1-260-123-11	CARBON	100K		1/2W
R8191	1-249-377-11	CARBON	0.47	5%	1/4W	R8843	1-216-833-11	METAL CHIP		5%	1/10W
R8196		METAL CHIP	47K	5% 5%	1/10W	R8844	1-216-829-11	METAL CHIP	4.7K		1/10W
R8197	1-216-841-11	METAL CHIP	4 / 1.	37	1/100	10044	1-210 025 11	raina cari	2.720	•	2/2011
R8203	1-208-789-11	METAL CHIP	2K	0.5%	1/10W	R8845	1-216-829-11	METAL CHIP	4.7K	5%	1/10W
R8204	1-216-295-91	SHORT CHIP	0			R8851	1-260-123-11	CARBON	100K	5%	1/2W
R8205	1-216-295-91	SHORT CHIP	0			R8852	1-260-123-11	CARBON	100K	5%	1/2W
R8206	1-216-849-11	METAL CHIP	220K	5%	1/10W	R8853	1-260-123-11	CARBON	100K	5%	1/2W
R8207	1-216-846-11	METAL CHIP	120K		1/10W	R8854	1-249-425-11	CARBON	4.7K	5%	1/4W
											•
R8209	1-216-295-91	SHORT CHIP	0			R8856	1-216-485-11	METAL OXIDE	5.6K		3W
R8210	1-216-825-11	METAL CHIP	2.2K		1/10W	R8857	1-216-485-11	METAL OXIDE	5.6K		3W
R8211	1-216-833-11	METAL CHIP	10K	5%	1/10W	R8858	1-215-922-11	METAL OXIDE	6.8K		3W
R8212	1-216-825-11	METAL CHIP	2.2K	5%	1/10W	R8859	1-215-922-11	METAL OXIDE	6.8K		3W
R8215	1-208-814-91	METAL CHIP	22K	0.5%	1/10W	R8865	1-216-829-11	METAL CHIP	4.7K	5%	1/10W
R8216	1-208-812-11	METAL CHIP	18K	0.5%	1/10W	R8866	1-216-295-91	SHORT CHIP	0		
R8217	1-216-833-11	METAL CHIP	10K	5%	1/10W	R8867	1-216-829-11	METAL CHIP	4.7K	5%	1/10W
R8219	1-216-841-11	METAL CHIP	47K	5%	1/10W	R8869	1-216-837-11	METAL CHIP	22K	5%	1/10W
R8220	1-216-834-11	METAL CHIP	12K	5%	1/10W	R8870	1-216-837-11	METAL CHIP	22K	5%	1/10W
R8221	1-216-837-11	METAL CHIP	22K	5%	1/10W	R8885	1-208-854-11	METAL CHIP	1M	0.5%	1/10W
									4.00	A =0	1 /1 Arr
R8223	1-164-230-11	CERAMIC CHIP			5.00% 50V	R8886	1-208-836-11	METAL CHIP			1/10W
R8224	1-216-827-11	METAL CHIP	3.3K	5%	1/10W	R8887	1-216-841-11	METAL CHIP		5%	1/10W
R8456	1-216-845-11	METAL CHIP	100K	5%	1/10W	R8888	1-249-441-11	CARBON	100K		1/4W
R8457	1-216-834-11	METAL CHIP	12K	5%	1/10W	R8895	1-249-443-11	CARBON	0.47		1/4W
R8458	1-216-841-11	METAL CHIP	47K	5%	1/10W	R8896	1-249-443-11	CARBON	0.47	5%	1/4W
R8459	1-216-825-11	METAL CHIP	2.2K	5%	1/10W	R8897	1-215-485-00	METAL	470K	1%	1/4W
R8800	1-247-895-91	CARBON	470K		1/4W	R8898	1-215-493-00	METAL		1%	1/4W
R8804	1-249-408-11	CARBON	180	5%	1/4W	R8899	1-215-493-00	METAL		18	1/4W
R8805	1-249-408-11	CARBON	180	5%	1/4W		, ,,,		*		* .
R8806	1-249-411-11	CARBON	330	5%	1/4W		< TRAN	ISFORMER >			
1,0000											
R8807	1-249-411-11	CARBON	330	5%	1/4W	300000000000000000000000000000000000000	A 8-598-851-50	TRANSFORMER	***************************************		
R8808	1-260-340-11	CARBON	10K	5%	1/2W	T8801	1-437-430-11	TRANSFORMER,			
R8809	1-260-340-11	CARBON	10K	5%	1/2W	T8802	1-437-430-11	TRANSFORMER,			
R8810	1-215-895-11	METAL OXIDE	3.3K		2W	T8852	1-433-487-12	TRANSFORMER,	FERRITE	(DFI	")
R8811	1-215-896-00	METAL OXIDE	4.7K	5%	2W						
R8812	1-216-461-00	METAL OXIDE	5.6K	5%	2W						
R8813	1-215-895-11	METAL OXIDE	3.3K		2W						
R8814	1-215-880-00	METAL OXIDE	10	5%	2W						
	1-215-880-00	METAL OXIDE	10	5% 5%	2W						
R8815		METAL OXIDE	0.47		2W						
R8816	1-216-365-00	METAL VAIDE	V.4/	Jo	4H						



REF.NO.	PART.NO	DESCRIPTION	REMARK	REF.NO.	PART.NO	DESCRIPTION		R	REMARK
	0-626-A VM B	oard Complete		Q7403	8-729-119-78	TRANSISTOR 25	C2785-H	IFE	
		-		Q7404	8-729-026-49	TRANSISTOR 25	:A1037AK	(-T14	6-R
	4-382-854-01	SCREW (M3X8), P,	SW (+)	Q7405	8-729-026-39	TRANSISTOR 25	A933AS-	QΤ	
				Q7406	8-729-045-05	TRANSISTOR 25	A2005		
	< CAPAC	CITOR >		Q7407	8-729-045-04	TRANSISTOR 25	C5511		
C7401	1-126-935-11	ELECT 470U	F 20.00% 16V	Q7408	8-729-026-49	TRANSISTOR 25	3A1037AF	K-T14	6-R
C7403	1-104-655-91	ELECT 470U	F 20.00% 6.3V	Q7409	8-729-010-29	TRANSISTOR MS	3D601-R5	ST1	
C7404	1-115-339-11	CERAMIC CHIP 0.1U	F 10.00% 50V						
C7405	1-126-933-11	ELECT 100U	F 20.00% 16V		< RESI	STOR >			
C7406	1-104-655-91	ELECT 470U	F 20.00% 6.3V						
				R7400	1-216-017-91	RES-CHIP	47	5%	1/10W
C7407	1-107-364-11	MYLAR 0.01	UF 10.00% 200V	R7401	1-216-061-91	RES-CHIP		5%	1/10W
C7408	1-107-364-11	MYLAR 0.01		R7402	1-216-041-00	RES-CHIP	470	5%	1/10W
C7409	1-107-649-11	ELECT 2.2U		R7403	1-249-393-11	CARBON	10	5%	1/4W
C7410	1-130-471-00	MYLAR 0.00		R7404	1-249-413-11	CARBON	470	5%	1/4W
C7411	1-130-471-00	MYLAR 0.00	1UF 5.00% 50V				4 500	<b>P</b> 0	1 /1 /27
				R7405	1-216-065-91	RES-CHIP		5%	1/10W
C7412	1-126-935-11	ELECT 470U		R7407	1-249-411-11	CARBON	330	5% =°	1/4W
C7413	1-126-935-11	ELECT 470U		R7409	1-216-029-00	RES-CHIP	150	5% 5%	1/10W 1/10W
C7414	1-107-652-11	ELECT 10UF		R7410	1-216-017-91	RES-CHIP	47 47	5% 5%	1/10W
C7415	1-107-363-91		68UF 10.00% 200V	R7411	1-216-017-91	RES-CHIP	4:1	26	I/IVM
C7418	1-163-021-91	CERAMIC CHIP 0.01	UF 10.00% 50V	27410	1 016 017 01	RES-CHIP	47	5%	1/10W
				R7412	1-216-017-91 1-249-414-11	CARBON	560	ეი 5%	1/4W
C7421	1-163-251-11	CERAMIC CHIP 100F	F 5.00% 50V	R7413 R7414	1-249-432-11	CARBON	18K	ა 5%	1/4W
				R7414 R7415	1-249-432-11	CARBON	100	ეზ 5%	1/2W
	< CONN	ECTOR >		R7415 R7416	1-247-739-11	CARBON	4.7	5%	1/4W
		DING CONTROLLS	n.	K/410	1-249-309-11	CARDON	3.7	•	±/ ***
CN7442	* 1-817-044-81	PLUG, CONNECTOR 7 PLUG, CONNECTOR 3		R7417	1-249-432-11	CARBON	18K	5%	1/4W
CN7443	* 1-564-506-11 * 1-770-747-11	CONNECTOR, BOARD		R7418	1-249-414-11	CARBON	560	5%	1/4W
CN7444	v I-//0-/4/-II	COMMECTOR, BOARD	10 DOMED 121	R7419	1-249-421-11	CARBON	2.2K	5%	1/4W
	< DIOD	r >		R7420	1-249-421-11	CARBON	2.2K	5%	1/4W
	1 0100	<b>.</b> ,		R7421	1-249-389-11	CARBON	4.7	5%	1/4W
D7400	8-719-991-33	DIODE 1SS133T-77							
D7401	8-719-991-33	DIODE 1SS133T-77		R7422	1-249-405-11	CARBON	100	5%	1/4W
D7402	1-535-303-00	LEAD, JUMPER (5.0	MM)	R7423	1-215-915-11	METAL OXIDE	470	5%	3W
D7403	8-719-991-33	DIODE 1SS133T-77	•	R7427	1-216-025-11	RES-CHIP	100	5%	1/10W
D7404	8-719-991-33	DIODE 1SS133T-77		R7428	1-216-033-00	RES-CHIP	220	5%	1/10W
				R7429	1-216-033-00	RES-CHIP	220	5%	1/10W
D7405	8-719-924-11	DIODE MTZJ-T-77-2	2					_	
D7406	8-719-924-11	DIODE MTZJ-T-77-2	2	R7432	1-216-065-91	RES-CHIP	4.7K		1/10W
				R7433	1-249-395-11	CARBON	15	5% -^	1/4W
	< FERR	ITE BEAD >		R7434	1-249-395-11	CARBON	15	5% =°	1/4W
			A1	R7435	1-216-033-00	RES-CHIP	220	5% = 0.	1/10W
FB7400	1-535-303-00	LEAD, JUMPER (5.		R7436	1-216-049-11	RES-CHIP	1K	5%	1/10W
FB7401	1-535-303-00	LEAD, JUMPER (5.	OMM)						
	< COIL	>							
L7400	1-414-934-21		UH						
L7402	1-414-934-21		UH						
L7403	1-414-934-21	INDUCTOR 10	UH						
	< TRAN	SISTOR >							
Q7400	8-729-010-29	TRANSISTOR MSD601	-RST1						
Q7401	8-729-010-29	TRANSISTOR MSD601							
Q7402	8-729-010-29	TRANSISTOR MSD601	-RST1						
				•					

REF.NO. PART.NO DESCRIPTION REMARK REF.NO. PART.NO DESCRIPTION REMARK

#### **MISCELLANEOUS**

△ 1-571-433-21 SWITCH, PUSH (AC POWER)
△ 1-823-853-11 CORD, POWER

1-424-855-11 COIL, CHOKE 29MMH

8-598-623-10 TUNER FSS BTP-AC421

△ 1-453-340-41 TRANSFORMER ASSY, FLYBACK (NX-4522//Z2B4)

1-529-408-11 SPEAKER (4.2X24CM)

1-910-000-50 WOOFER LS

△ 8-451-504-31 DEFLECTION YOKE (Y29RSC-5)

1-452-896-11 COIL, NA ROTATION (RT200)

△ 8-453-021-21 NECK ASSY, (NA-2919-M2)

△ 1-424-888-11 COIL, DEGAUSSING

△ 1-251-946-11 CAP ASSY, HIGH-VOLTAGE

A 8-735-097-05 PICTURE TUBE (M68LNH060X)

1-452-094-00 MAGNET, ROTATABLE DISK; 15MM Ø

1-425-032-00 MAGNET, DISK; 10MM Ø

### ACCESSORIES AND PACKAGING MATERIALS

\*4-102-972-01 INDIVIDUAL CARTON

\*4-102-973-01 CUSHION UPPER

\*4-102-974-01 CUSHION LOWER

4-395-957-01 BAG, PROTECTION

2-024-605-11 INSTRUCTION MANUAL (GERMAN/TURKISH/GREEK)

(KV-29XL71E)

2-024-605-21 INSTRUCTION MANUAL (ITALIAN) (KV-29XL71E)

2-024-605-31 INSTRUCTION MANUAL ((NORWEGIAN/PORTUGUESE/

SWEDISH/FINNISH/SPANISH/DANISH)) (KV-29XL71E)

2-024-605-41 INSTRUCTION MANUAL (HUNGARIAN/CZECH/ENGLISH/

POLISH/RUSSIAN/BULGARIAN) (KV-29XL71K)

4-103-137-11 INSTRUCTION MANUAL (GERMAN/TURKISH/GREEK)

(KV-29XL70E)

4-103-137-21 INSTRUCTION MANUAL (ITALIAN) (KV-29XL70E)

4-103-137-31 INSTRUCTION MANUAL (NORWEGIAN/PORTUGUESE/

SWEDISH/FINNISH/SPANISH/DANISH) (KV-29XL70E)

4-103-137-41 INSTRUCTION MANUAL (HUNGARIAN/CZECH/ENGLISH/

POLISH/RUSSIAN/BULGARIAN) (KV-29XL70K)

# REMOTE COMMANDER

1-476-700-12 REMOTE COMMANDER (RM-934) (KV-29XL71)

1-478-654-11 REMOTE COMMANDER (RM-944) (KV-29XL70)

# TRACE

A new TV Repair Assistance Tool that combines ease of use and powerful PC software tools to allow you to save valuable time during many TV repairs.



The TRACE interface connects to the PC's serial port. It provides connection to the TV's  $I^2C$  bus and can be provided with an InfraRed transmitter (optional).

The interface is powered by a standard 9 V PP3 battery for portable use, and can also be powered by an external 9V/25mA DC power supply.

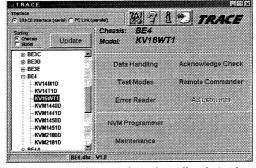
The TRACE software that is supplied with the interface allows you to:

- Read, restore and compare NVM contents via the I2C bus
- Acknowledge check of all I2C devices in the TV set
- Read Error Codes (emulation of the Error Reader tool)

With the optional IR Add-on kit, the following features can be added:

- Remote Commander emulation
- User programmable Functional Check through Infrared
- Fast and documented Test Mode setting of all Sony TV chassis

Additional features such as Adjustments and Troubleshooting are available in chassis-dependent software modules. Please contact your local Sony Service organisation for the latest information.



Note: For workshops already using the existing I<sup>2</sup>C Link parallel port interface (9-948-320-30), this software can be used as well, replacing the TV Data Handling software (9-948-340-50), but Error Reader and IR functions can only be accessed with the TRACE interface.

Partnumbers: TRACE Starter Kit (TRACE interface + software): 9-948-320-70

TRACE Software (for users of the I<sup>2</sup>C Link interface): 9-948-340-80

TRACE IR Add-on (IR interface + Remote Commander software): 9-948-320-80

PC requirements: IBM-compatible PC with operating system Windows95, Windows98, or WindowsNT\*.

\* WindowsNT only supported with TRACE interface